

# CONTENTS

## NUMBER 1, JANUARY, 1998

**1 WOMEN, SMOKING, AND LUNG CANCER** Diane E. Stover, New York

**2 PHRENIC NERVE DYSFUNCTION FOLLOWING CORONARY ARTERY BYPASS GRAFTING: AN AGGRAVATION OR A REAL PROBLEM?** John C. Alexander, Jr., Evanston, Illinois

**3 OPEN-CHEST RESUSCITATION AND POST-CARDIAC SURGERY ARREST** Ronald C. Hill, Morgantown, West Virginia

**3 IDENTIFICATION OF BENIGN PULMONARY NODULES BY NEEDLE BIOPSY** Glen A. Lillington; Michael K. Gould, Stanford, California

**5 VENOUS THROMBOEMBOLISM IN THE INTENSIVE CARE UNIT: THE LAST FRONTIER FOR PROPHYLAXIS** Samuel Z. Goldhaber, Boston

**8 PHRENIC NERVE DYSFUNCTION AFTER CARDIAC OPERATIONS: ELECTROPHYSIOLOGIC EVALUATION OF RISK FACTORS** Ioanna Dimopoulos; Maria Dagani; Urnia Dafni; Anna Karakatsani; Mazen Khouri; Stephanos Geroulas; John Jordanoglou, Athens, Greece

**15 UNEXPECTED CARDIAC ARREST AFTER CARDIAC SURGERY: INCIDENCE, PREDISPOSING CAUSES, AND OUTCOME OF OPEN CHEST CARDIOPULMONARY RESUSCITATION** Anastasia Anithi; George E. Tzlepis, Athens, Greece; Peter A. Alivizatos, Dallas; Alkis Michalis; George M. Palatianos; Stephanos Geroulas, Athens, Greece

**20 NESTED POLYMERASE CHAIN REACTION FOR DETECTION OF *MYCOTUBERCULOSIS* IN SOLITARY PULMONARY NODULES** Jae Jeong Shim; Hee Jin Cheong, Seoul, Korea; Eun-Young Kang, Vancouver, Canada; Kwang Ho In; Se Hwa Yoo; Kyung Ho Kang, Seoul, Korea

**25 TUBERCULIN AND ANERGY SKIN TESTING OF PATIENTS RECEIVING LONG-TERM HEMODIALYSIS** Meg Smrroff, New York; Cary Patt; Benjamin Seckler, Boston; Jack J. Adler, Larchmont, New York

**28 IMPACT OF CLINICAL PATHWAYS AND PRACTICE GUIDELINES ON THE MANAGEMENT OF ACUTE EXACERBATIONS OF BRONCHIAL ASTHMA** Raymond Bailey, Los Angeles; Scott R. Weingarten, Beverly Hills, California; Michael Ian Lewis; Zab Mohsenifar, Los Angeles

**34 CONCOMITANT ADMINISTRATION OF LOW-DOSE PREDNISOLONE PROTECTS AGAINST *IN VIVO*  $\beta_2$ -ADRENOCEPTOR SUBSENSITIVITY INDUCED BY REGULAR FORMOTEROL** Kia S. Tan; Lesley C. McFarlane; Brian J. Lipworth, Dundee, Scotland

**42 THE SPECTRUM OF IRRITANT-INDUCED ASTHMA: SUDDEN AND NOT-SO-SUDDEN ONSET AND THE ROLE OF ALLERGY** Stuart M. Brooks; Yahia Hammad; Ira Richards; Joette Giovino-Barbas; Kathleen Jenkins, Tampa, Florida

**50 DIAGNOSTICS OF SPONTANEOUS COUGH IN CHILDHOOD ASTHMA: RESULTS OF CONTINUOUS TRACHEAL SOUND RECORDING IN THE HOMES OF CHILDREN** Simon Rietveld, Amsterdam, the Netherlands; Lous H.M. Rijssenbeek-Nouwens, Hilversum, the Netherlands

**55 NO PARADOXICAL BRONCHODILATOR RESPONSE WITH FORCED OSCILLATION TECHNIQUE IN CHILDREN WITH CYSTIC FIBROSIS** Johan Hellinckx; Kris De Boeck; Maurits G.P. Demedts, Leuven, Belgium

**60 DYSPNEA RATINGS FOR PRESCRIPTION OF CROSS-MODAL EXERCISE IN PATIENTS WITH COPD** Mitchell B. Horowitz; Donald A. Mahler, Lebanon, New Hampshire

**65 EFFECTS OF LONG-TERM OXYGEN THERAPY ON PULMONARY HEMODYNAMICS IN COPD PATIENTS: A 6-YEAR PROSPECTIVE STUDY**

**Jan Zieliński; Mirosław Tobiasz; Iwona Hawrylikiewicz; Paweł Siwiński; Grzegorz Palasiewicz, Warsaw, Poland**

**71 DOSE-RESPONSE RELATIONSHIP AND IRREVERSIBLE OBSTRUCTIVE VENTILATORY DEFECT IN PATIENTS WITH CONSUMPTION OF SAUROPS ANDROGYNUS** Tzu-en Ren Hsieh; Yueliang Leon Guo; Kuang-wen Chen; Chang-Wen Chen; Cheng-Hung Lee; Han-Yu Chang, Taiwan, Taiwan ROC

**77 IMPACT OF TRACHEOTOMY ON COLONIZATION AND INFECTION OF LOWER AIRWAYS IN CHILDREN REQUIRING LONG-TERM VENTILATION: A PROSPECTIVE OBSERVATIONAL COHORT STUDY** Pradeep Morar; Vivian Singh; Andrew S. Jones; Julie Hughes; Rick van Saene, Liverpool, UK

**86 COPD AND OTHER DISEASES IN CHRONICALLY VENTILATED PATIENTS IN A PROLONGED RESPIRATORY CARE UNIT: A RETROSPECTIVE 20-YEAR SURVIVAL STUDY** John J. Votto; Janet Brancifort; Paul J. Scalise; Christine M. Wollschlager, New Britain, Connecticut; Richard L. ZuWallack, Hartford, Connecticut

**91 PREVALENCE OF PATENT FORAMEN OVALE AND ITS CONTRIBUTION TO HYPOXEMIA IN PATIENTS WITH OBSTRUCTIVE SLEEP APNEA** Hany Shanoudy; Adel Soliman, Salem, Virginia; Paolo Raggi, Hendersonville, Tennessee; Jing Win Liu; Douglas C. Russell; Nabil F. Jarmukli, Salem, Virginia

**97 COST-EFFECTIVENESS ANALYSIS OF NOCTURNAL OXIMETRY AS A METHOD OF SCREENING FOR SLEEP APNEA-HYPOPNEA SYNDROME** Lawrence J. Epstein, West Roxbury, Massachusetts; Gina R. Dorlac, Travis AFB, California

**104 EFFECTS OF CARDIAC DYSFUNCTION ON NON-HYPERCAPNIC CENTRAL SLEEP APNEA** Peter Solin, Plano, Texas; Teunau Roebuck; John Swieca; Eugene H. Walters; Matthew T. Naughton, Melbourne, Australia

**111 CT IN THE EVALUATION OF THE UPPER AIRWAY IN HYPERHYDROTIC SUBJECTS AND IN PATIENTS WITH OBSTRUCTIVE SLEEP APNEA SYNDROME** Paloma Caballero; Rodolfo Alvarez-Sala; Francisco García Rio; Concepción Prados; Miguel Hernan; Jose Villamor; Jose L. Alvarez-Sala, Madrid, Spain

**117 MIXED (NEUTROPHIL-RICH) INTERSTITIAL PNEUMONITIS IN BIOPSY SPECIMENS OF LUNG ALLOGRAFTS: A CLINICOPATHOLOGIC EVALUATION** Josh W. McDonald; Cesar A. Keller; Ricardo R. Ramos; Elizabeth M. Brunt, St. Louis

**124 COST-EFFECTIVENESS OF LUNG TRANSPLANTATION IN THE NETHERLANDS: A SCENARIO ANALYSIS** Maiwenn J. Al; Marc A. Koopmanschap, Rotterdam, the Netherlands; Petra J. van Enckevort; Albert Geertsema; Wim van der Bijl; Willem J. de Boer; Elisabeth M. TerVerger, Groningen, the Netherlands

**131 A 1-YEAR COMMUNITY-BASED HEALTH ECONOMIC STUDY OF CIPROFLOXACIN VS USUAL ANTIBIOTIC TREATMENT IN ACUTE EXACERBATIONS OF CHRONIC BRONCHITIS: THE CANADIAN CIPROFLOXACIN HEALTH ECONOMIC STUDY GROUP** Ronald F. Grossman; Jayanti Mukherjee; David Vaughan; Clive Eastwood, Toronto, Canada; Richard C. Cook, Vancouver, Canada; Jacques LaForge; Noel Lampron, Toronto, Canada

**142 THE CLINICAL BENEFIT OF IN-HOSPITAL OBSERVATION IN 'LOW-RISK' PNEUMONIA PATIENTS AFTER CONVERSION FROM PARENTERAL TO ORAL ANTIMICROBIAL THERAPY** David C. Rhew; Dani Hackner; Leon Henderson; A. Gray Ellroot, Los Angeles; Scott R. Weingarten, Beverly Hills, California

**147 MEDIASTINOSCOPY IN PATIENTS WITH PRE-SUMPTIVE STAGE I SARCOIDOSIS: A RISK/BENEFIT, COST/BENEFIT ANALYSIS** Jerome M. Reich; Matthew C. Brouns; Elizabeth A. O'Connor; Miles J. Edwards, Portland, Oregon

**154 AIDS-RELATED BRONCHIOGENIC CARCINOMA: FACT OR FICTION?** Mark S. Parker; Debra M. Levento; Tamara J. Campbell, Dallas; John A. Worrell, Nashville, Tennessee; Susan E. Carozza, Austin, Texas

**162 UTILIZATION OF VENOUS THROMBOEMBOLISM PROPHYLAXIS IN A MEDICAL-SURGICAL ICU** Richard P. Ryskamp; Steven J. Trottier, St. Louis

**165 BENEFIT OF HEPARIN IN CENTRAL VENOUS AND PULMONARY ARTERY CATHETERS: A META-ANALYSIS OF RANDOMIZED CONTROLLED TRIALS** Adrienne G. Randolph, Boston; Deborah J. Cook, Hamilton, Canada; Calle A. Gonzales; Maureen Andrew, Hamilton, Canada

**172 A SYSTEMATIC REVIEW OF THE COST-EFFECTIVENESS OF NONCARDIAC TRANSITIONAL CARE UNITS** Sean P. Keenan; David Massell; Kevin J. Irman; William J. Sibbald, London, Canada

**178 EVALUATION OF POTENTIAL FAT EMBOLI DURING PLACEMENT OF INTRAMEDULLARY NAILS AFTER ORTHOPEDIC FRACTURES** Noriaki Aoki, Kanagawa, Japan; Kazui Soma; Masateru Shindo; Toshiro Kurosawa, Takashi Ohwada, Kyoto, Japan

**182 TECHNIQUES IN HUMAN AIRWAY INFLAMMATION: QUANTITY AND MORPHOLOGY OF BRONCHIAL BIOPSY SPECIMENS TAKEN BY FORCEPS OF THREE SIZES** Roelof M. Aleva, Eindhoven, the Netherlands; Jan Kraan; Mieke Smith; Nick H. T. ten Hacken; Dirkje S. Postma; Wim Timens, Groningen, the Netherlands

**186 SALBUTAMOL DELIVERY FROM A HYDROFLUOROALKANE PRESSURIZED METERED-DOSE INHALER IN PEDIATRIC VENTILATOR CIRCUITS: AN *IN VITRO* STUDY** Johannes H. Wildhaber; Mark J. Hayden; Nigel D. Dore; Sunalene G. Devadason; Peter N. Le-Souef, Subiaco, Australia

**192 DIAGNOSTIC AND MANAGEMENT STRATEGIES FOR DIFFUSE INTERSTITIAL LUNG DISEASE** Herbert Y. Reynolds, Hershey, Pennsylvania

**203 MULTIFOCAL ATRIAL TACHYCARDIA** James McCord; Steven Borzak, Detroit

**210 THE LONG SUFFERING OF FREDERIC CHOPIN** Adam K. Kubba, Manchester, England; Madeleine Young, Edinburgh, England

**217 LUNG TRANSPLANTATION IN CYSTIC FIBROSIS: CONSENSUS CONFERENCE STATEMENT** James R. Yankaskas, Chapel Hill, North Carolina; George B. Mallory, Jr., St. Louis

**227 HILAR MASS AND PAPILLEDEMA ON PRESENTATION** Khalid J. Malik, Morgantown, West Virginia; Susan L. Weber, Moon Township, Pennsylvania; Syed Sohail; Marvin R. Balaan, Morgantown, West Virginia

**231 A 39-YEAR-OLD SMOKER WITH EFFORT DYSPNEA, NORMAL SPIROMETRY RESULTS, AND LOW DIFFUSING CAPACITY** Nyat Kooi Chin; Tow K. Lim, Singapore, Singapore

**234 MYCOBACTERIUM TUBERCULOSIS MINIENDemic IN A CHURCH GOSPEL CHOIR** Bonita T. Mangura; Eileen C. Napolitano; Marian R. Passannante; Reynard J. McDonald; Lee B. Reichman, Newark, New Jersey

**237 MASSIVE PULMONARY EDEMA AND DEATH AFTER PROSTACYCLIN INFUSION IN A PATIENT WITH PULMONARY VENO-OCLUSIVE DISEASE** Scott M. Palmer, Jr.; Lisa J. Robinson; Andrew Wang, Durham, North Carolina; James R. Gosage, Augusta, Georgia; Thomas M. Bashore; Victor F. Tapson, Durham, North Carolina

**240 BILATERAL PARTIAL BRONCHIAL OBSTRUCTION DUE TO BRONCHOLITHIASIS TREATED WITH LASER THERAPY** Richard W. Snyder, Abington, Pennsylvania; Michael Unger, Philadelphia; Rafal W. Sawicki, Abington, Pennsylvania

243 5-HT<sub>1D</sub> RECEPTOR MEDIATES THE SUPER-SENSITIVITY OF ISOLATED CORONARY ARTERY TO SEROTONIN IN VARIANT ANGINA  
Tatsuro Ishida; Ken-ichi Hirata; Tsuyoshi Sakoda; Kenji Kanazawa; Seinosuke Kawashima; Hozuka Akiti; Mitsuhiro Yokoyama, Kobe, Japan

244 AN UNUSUAL PRESENTATION OF METASTATIC COLON CANCER TO THE LUNG  
Elias A. Zias; Randall P. Owen; Alain Borczuk, Bronx, New York; Joseph Reichel, New York; Robert W. M. Frater, Bronx, New York

246 DYSPNEA RESULTING FROM FIBROMYALGIA  
Daniel J. Weiss; Thomas C. Kreck, Seattle; Richard K. Albert, Denver

249 USUAL INTERSTITIAL PNEUMONITIS RESPONSIVE TO CORTICOSTEROIDS FOLLOWING VARICELLA PNEUMONIA  
Joseph M. Keane; Bernadette R. Gochuico; John Kasznica; Hardy Kornfeld, Boston

252 EROSION OF IMPLANTABLE CARDIOVERTER DEFIBRILLATOR PATCH ELECTRODE INTO AIRWAYS: AN UNUSUAL CAUSE OF RECURRENT HEMOPTYSIS  
Asok Dasgupta, Cleveland Heights, Ohio; Atul C. Mehta; Thomas William Rice; Patrick R. Tchou; Yvonne Meli; Herbert P. Wiedemann, Cleveland

254 ENDOBRONCHIAL LIPOSOMATOUS HAMARTOMA: A RARE CAUSE OF BRONCHIAL OCCLUSION  
Claudia A. Stey; Peter Vogt; Erich W. Russi, Zurich, Switzerland

256 ARE DIGITAL CHEST X-RAYS GOOD ENOUGH?  
Bennett E. Ojserkis, Linwood, New Jersey

256 THE ABCS OF CHEST X-RAY FILM INTERPRETATION  
Robert S. Crausman, Pawtucket, Rhode Island

257 CHRONIC VENTILATOR UNIT ADMISSION CRITERIA  
Douglas R. Gracey, Rochester, Minnesota

Response—Peter H. Bagley, Worcester, Massachusetts

258 THE ETHICS OF BILEVEL POSITIVE AIRWAY PRESSURE  
Robert S. Crausman, Pawtucket, Rhode Island

258 SLEEP APNEA BLOWN AWAY BY CPAP  
Marilyn Baetz; Ruzaica Jokic, Saskatoon, Canada; Michael F. Fitzpatrick, Kingston, Canada

*Ronald B. Natale, Los Angeles*

405 BIOLOGY AND CHEMOPREVENTION OF LUNG CANCER  
Jill M. Siegfried, Pittsburgh

465 CONSIDERATIONS IN OPTIMIZING RADIATION THERAPY FOR NON-SMALL CELL LUNG CANCER  
Joel S. Greenberger; Sanjeev Bahri, Pittsburgh; James R. Jett, Rochester, Minnesota; Chandra P. Belani; Andre Kalend; Michael Eppery, Pittsburgh

535 COMBINED-MODALITY TREATMENT OF LOCALLY ADVANCED NON-SMALL CELL LUNG CANCER: INCORPORATION OF NOVEL CHEMOTHERAPEUTIC AGENTS  
Chandra P. Belani; Ramesh K. Ramanathan, Pittsburgh

615 MULTIMODALITY MANAGEMENT OF MALIGNANT PLEURAL MESOTHELIOMA  
David J. Sugarbaker; Jose J. Norberto, Boston

665 A REVIEW OF CHEMOTHERAPY TRIALS FOR MALIGNANT MESOTHELIOMA  
Christopher W. Ryan, Chicago; James Herndon, Durham, North Carolina; Nicholas J. Vogelzang, Chicago

745 MALIGNANT PLEURAL EFFUSIONS: RECENT ADVANCES AND AMBULATORY SCLEROTHERAPY  
Edward F. Patz, Jr., Durham, North Carolina

785 TREATING MALIGNANT PLEURAL EFFUSIONS COST CONSCIOUSLY  
Chandra P. Belani; Tammy S. Pajean, Pittsburgh; Charles L. Bennett, Chicago

865 NEW AGENTS IN THE TREATMENT OF SMALL CELL LUNG CANCER  
Maya Ghaemmaghami, Pittsburgh; James R. Jett, Rochester, Minnesota

925 RADIATION THERAPY IN THE MANAGEMENT OF LIMITED SMALL CELL LUNG CANCER: WHEN, WHERE, AND HOW MUCH?  
Henry Wagner, Jr., Tampa, Florida

1015 DOSE-INTENSIVE THERAPY IN SMALL CELL LUNG CANCER  
Anthony Elias, Boston

1075 ADVANCES IN STAGING OF ESOPHAGEAL CARCINOMA  
Mark J. Krasna, Baltimore

1125 CURRENT STATUS OF NEW DRUGS AND MULTIDISCIPLINARY APPROACHES IN PATIENTS WITH CARCINOMA OF THE ESOPHAGUS  
Jaffer A. Ajani, Houston

1205 FUTURE DIRECTIONS IN ESOPHAGEAL CANCER  
James D. Luketich; Philip Schauer; Katie Ursi; Edmund Kassis; Peter F. Ferson; Robert J. Keenan; Rodney J. Landreneau, Pittsburgh

## NUMBER 1, JANUARY, 1998 SUPPLEMENT

15 INTRODUCTION: INTERNATIONAL SYMPOSIUM ON THORACIC MALIGNANCIES  
Chandra P. Belani, Pittsburgh

25 VIDEO-ASSISTED THORACOSCOPIC SURGERY FOR RESECTION OF LUNG METASTASES  
Robert D. Dowling, Louisville, Kentucky; Rodney J. Landreneau, Pittsburgh; Daniel L. Miller, Louisville, Kentucky

65 THE ROLE OF THORACOSCOPY IN LUNG CANCER MANAGEMENT  
Rodney J. Landreneau, Pittsburgh; Michael J. Mack, Dallas; Robert D. Dowling, Louisville, Kentucky; James D. Luketich; Robert J. Keenan; Peter F. Ferson, Pittsburgh; Stephen R. Hazelrigg, Springfield, Illinois

135 EASTERN COOPERATIVE ONCOLOGY GROUP EXPERIENCE WITH CHEMOTHERAPY IN ADVANCED NON-SMALL CELL LUNG CANCER  
Philip Bonomi, Chicago

175 NEW CHEMOTHERAPEUTIC AGENTS FOR THE TREATMENT OF NON-SMALL CELL LUNG CANCER: THE JAPANESE EXPERIENCE  
Nagahiro Saito, Tokyo, Japan

245 NEW CHEMOTHERAPEUTIC AGENTS IN THE TREATMENT OF NON-SMALL CELL LUNG CANCER: THE AUSTRALIAN EXPERIENCE  
Michael J. Boyer, Camperdown, Australia

285 CHEMOTHERAPY FOR NON-SMALL CELL LUNG CANCER: THE EXPERIENCE OF THE LUNG CANCER COOPERATIVE GROUP OF THE EUROPEAN ORGANIZATION FOR RESEARCH AND TREATMENT OF CANCER  
Pieter E. Postmus, Amsterdam, the Netherlands

325 EXPERIENCE WITH NEW CHEMOTHERAPEUTIC AGENTS IN NON-SMALL CELL LUNG CANCER  
John G. Teeter, Eugene R. Bleeker, Baltimore

278  $\beta_2$ -ADRENOCEPTOR REGULATION AND FUNCTION IN FEMALE ASTHMATIC PATIENTS RECEIVING THE ORAL COMBINED CONTRACEPTIVE PILL  
Kia S. Tan; Lesley C. McFarlane; Brian J. Lipworth, Dundee, Scotland

283 PROVENTIL HFA PROVIDES BRONCHODILATION COMPARABLE TO VENTOLIN OVER 12 WEEKS OF REGULAR USE IN ASTHMATICS  
Eugene R. Bleeker, Baltimore; David Tinkelman, Denver; Joe W. Ramsdell, San Diego; Bruce P. Ekholm; Nancy M. Klinger; Gene L. Colice; Herbert B. Slade, St. Paul, Minnesota

290 PROVENTIL HFA AND VENTOLIN HAVE SIMILAR SAFETY PROFILES DURING REGULAR USE  
David Tinkelman, Denver; Eugene R. Bleeker, Baltimore; Joe W. Ramsdell, San Diego; Bruce P. Ekholm; Nancy M. Klinger; Gene L. Colice; Herbert B. Slade, St. Paul, Minnesota

297 COMPARATIVE KNOWLEDGE AND PRACTICE OF EMERGENCY PHYSICIANS, CARDIOLOGISTS, AND PRIMARY CARE PRACTITIONERS REGARDING DRUG THERAPY FOR ACUTE MYOCARDIAL INFARCTION  
Lawrence A. Melniker; Paul J. Leo, Brooklyn, New York

306 IS DOBUTAMINE-INDUCED SINUS NODE DECCELERATION A MARKER OF SIGNIFICANT STENOSIS OF THE RIGHT CORONARY ARTERY?  
Masaaki Takeuchi, Fukuoka, Japan; Hideyuki Hanada; Tetsuya Numata, Kitakyushu, Japan

312 DIMINISHED SHORT-TERM HEART RATE VARIABILITY PREDICTS INDUCIBLE VENTRICULAR TACHYCARDIA  
Mahesh Bikkin; Martin A. Alpert; Rita Mukerji; Madhu Mulekar; Bae-Yong Cheng; Vaskar Mukerji, Mobile, Alabama

317 DECREASED BASAL PRODUCTION OF NITRIC OXIDE IN PATIENTS WITH HEART DISEASE  
Hiroyuki Sumino; Kunio Sato; Tetsuo Sakamaki; Hiroaki Masuda; Tetsuya Nakamura, Gunma, Japan; Tsugiyasu Kanda; Maebashi, Japan; Ryogo Nagai, Gunma, Japan

323 CAN QUANTITATIVE CAPNOMETRY DIFFERENTIATE BETWEEN CARDIAC AND OBSTRUCTIVE CAUSES OF RESPIRATORY DISTRESS?  
Lawrence H. Brown; John E. Gough; Rosa H. Seim, Greenville, North Carolina

327 HEART RATE VARIABILITY REFLECTS SEVERITY OF COPD IN PIZ  $\alpha_1$ -ANTITRYPSIN DEFICIENCY  
Phyllis K. Stein, St. Louis; Patricia L. Nelson, Salt Lake City, Utah; Jeffrey N. Rottman, Daniel Howard; Suzanne M. Ward; Robert E. Kleiger; Robert M. Senior, St. Louis

334 ACUTE OXYGEN SUPPLEMENTATION DOES NOT RELIEVE THE IMPAIRMENT OF RESPIRATORY MUSCLE STRENGTH IN HYPOXEMIC COPD  
Raffaele Antonelli Incalzi, Rome, Italy; Leonello Fusco, Rome, Italy; Teresa Ricci, San Giovanni Rotondo, Italy; Sandra Sammarro, Rome, Italy; Antonio DiCorcia; Aldo Albano, San Giovanni Rotondo, Italy; Riccardo Pistelli, Rome, Italy

340 THE INFLUENCE OF SILICOSIS ON DETERIORATING LUNG FUNCTION IN GOLD MINERS  
Robert L. Cowie, Calgary, Canada

344 BRONCHIAL STENOSIS DUE TO ANTHRACOFIBROSIS  
Man Pyo Chung; Kyung Soo Lee; Joongho Han; Hojoong Kim; Chong H. Rhee; Yong Choi Han; O Jung Kwon, Seoul, Korea

351 RESPIRATORY SYMPTOMS IN A SUSCEPTIBLE POPULATION DUE TO BURNING OF AGRICULTURAL RESIDUE  
Wenqiang Long; Robert B. Tate, Winnipeg, Canada; Michael Neuman, Cleveland; Jure Mandreda; Allan B. Becker; Nicholas R. Anthonisen, Winnipeg, Canada

358 THE EFFECT OF LUNG TRANSPLANTATION ON HEALTH-RELATED QUALITY OF LIFE: A LONGITUDINAL STUDY  
Elisabeth M. Ten Vergert, Groningen, the Netherlands; Marie-Louise Essink-Bot, Rotterdam, the Netherlands; Albert Geertsma; Petra J. van Eckevort; Willem J. de Boer; Wim van der Bijl, Groningen, the Netherlands

365 BRONCHIOLITIS OBLITERANS AFTER LUNG TRANSPLANTATION: DETECTION USING EXPIRATORY HRCT  
Ann N. Leung, Stanford, California; Kendra Fisher, Saskatoon, Canada; Vincent G. Valen-

tine, New Orleans; Reda E. Girgis, Detroit; Gerald J. Berry, Stanford, California; Robert C. Robbins, Palo Alto, California; James Theodore, Stanford, California

371 METALLOTHIONEIN EXPRESSION IN HUMAN LUNG AND ITS VARYING LEVELS AFTER LUNG TRANSPLANTATION  
Monique Courtade; Georges Carrera; Jose L. Pernain; Simon Martel, Toulouse, France; Philippe Carré, Carcassonne, France; Jaume Folch; Bernard Pipy, Toulouse, France

379 TIME TO DETECTION OF MYCOBACTERIUM TUBERCULOSIS IN SPUTUM CULTURE CORRELATES WITH OUTCOME IN PATIENTS RECEIVING TREATMENT FOR PULMONARY TUBERCULOSIS  
Matthew D. Epstein, Warwick, Rhode Island; Neil W. Schluger; Amy L. Davidow; Stanley Bonk; William N. Rom; Bruce A. Hanna, New York

387 STREPTOCOCCUS PNEUMONIAE BACTEREMIA IN A COMMUNITY HOSPITAL  
Jose Miguel Torres; Omar Cardenas; Andres Vasquez; David Schlossberg, Philadelphia

391 BRONCHIOALVEOLAR CARCINOMA: HISTOPATHOLOGIC STUDY OF EVOLUTION IN A SERIES OF 105 SURGICALLY TREATED PATIENTS  
Pascal Dumont; Bernard Gasser; Clothilde Rouge; Gilbert Massard; Jean-Marie Whilm, Tours, France

396 SURVIVAL IN PATIENTS WITH CRYPTOGENIC FIBROSING ALVEOLITIS: A POPULATION-BASED COHORT STUDY  
Richard Hubbard; Ian D. Johnston; John Britton, Nottingham, United Kingdom

401 BAL FLUID CONTAINS DETECTABLE SUPER-OXIDE DISMUTASE 1 ACTIVITY  
Robert A. DiSilvestro; Eric R. Pachl, Columbus, Ohio; W. Bruce Davis, Augusta, Georgia; Nizar N. Jarjour, Madison, Wisconsin; Hyojin Joung; Kathleen Trelo-Fulop, Columbus, Ohio

405 EXTENDING VENTILATOR CIRCUIT CHANGE INTERVAL BEYOND 2 DAYS REDUCES THE LIKELIHOOD OF VENTILATOR-ASSOCIATED PNEUMONIA  
James B. Fink, Hines, Illinois; Sally A. Krause, Maywood, Illinois; Linda Barrett; Doris Schaaff; Charles G. Alex, Hines, Illinois

412 THE INFLUENCE OF MINI-BAL CULTURES ON PATIENT OUTCOMES: IMPLICATIONS FOR THE ANTI-BIOTIC MANAGEMENT OF VENTILATOR-ASSOCIATED PNEUMONIA  
Marin H. Koller; Suzanne M. Ward, St. Louis

421 PREDICTORS OF SHORT- AND LONG-TERM SURVIVAL IN HIV-INFECTED PATIENTS ADMITTED TO THE ICU  
Enrique Casalino; Gabriela Mendoza-Sassi; Michel A. Wolff; Jean-Pierre Bedos; Christiane Gaudebout; Bernard Regnier; Francois Vachon, Paris, France

430 CD4 LYMPHOCYTE COUNTS AND MORTALITY IN AIDS PATIENTS REQUIRING MECHANICAL VENTILATOR SUPPORT DUE TO PNEUMOCYSTIS CARINII PNEUMONIA  
Sunil D. Kumar, North Bay Village, Florida; Bruce P. Krieger, Miami Beach, Florida

434 MEASURING RESOURCE USE IN THE ICU WITH COMPUTERIZED THERAPEUTIC INTERVENTION SCORING SYSTEM-BASED DATA  
Gilles Clermont; Derek C. Angus, Pittsburgh; Walter Linde-Zwirble, Doylestown, Pennsylvania; Judith R. Lave; Michael R. Pinsky, Pittsburgh

443 EVALUATION OF RESPIRATORY INDUCTIVE PLETHYSMOGRAPHY IN CONTROLLED VENTILATION: MEASUREMENT OF TIDAL VOLUME AND PEEP-INDUCED CHANGES OF END-EXPIRATORY LUNG VOLUME  
Peter Neumann; Jorg Zinslerling; Christian Haase; Michael Sydow; Hilmar Burchardi, Gottingen, Germany

452 ACTIVATION OF PLATELETS IN BRONCHIAL ASTHMA  
Chie Moritani; Shinichi Ishioka; Yoshinori Haruta; Masayuki Kambe; Michio Yamakido, Hiroshima, Japan

459 PULMONARY EPITHELIAL PERMEABILITY AND GAS EXCHANGE: A COMPARISON OF INVERSE RATIO VENTILATION AND CONVENTIONAL MECHANICAL VENTILATION IN OLEIC ACID-INDUCED LUNG INJURY IN RABBITS  
Ulf Ludwigs; Anders Philip, Stockholm, Sweden

467 QUALITY OF LIFE IN PATIENTS WITH LUNG CANCER: A REVIEW OF LITERATURE FROM 1970 TO 1995  
Ali Montazeri, Tehran, Iran; Charles R. Gillis; James McEwen, Glasgow, Scotland

482 VENTRICULAR ARRHYTHMIAS IN ADULT AORTIC STENOSIS: PREVALENCE, MECHANISMS AND CLINICAL RELEVANCE  
Alberico Soriano; Pompilio Faggiano, Brescia, Italy; Gerald P. Aurigemma, Worcester, Massachusetts; Cesare Rusconi, Brescia, Italy; William H. Gaasch, Burlington, Massachusetts

492 THE OBESSE PATIENT IN THE ICU  
Paul E. Marik, Worcester, Massachusetts; Joseph Varon, Houston

499 OPINIONS REGARDING THE DIAGNOSIS AND MANAGEMENT OF VENOUS THROMBOEMBOLIC DISEASE  
Paul D. Stein, Detroit; Samuel Z. Goldhaber, Boston; Alexander Gottschalk, East Lansing, Michigan; Russell D. Hull, Calgary, Canada; Thomas M. Hyers, St. Louis; Kenneth V. Leeper, Jr., Memphis, Tennessee; Kenneth M. Moser, San Diego; Graham F. Pineo, Calgary, Canada; Gary E. Raskob, Oklahoma City; Herbert A. Saltzman; Henry D. Sostman; Victor F. Tapson, Durham, North Carolina

505 THE EFFECT OF GLUCOCORTICOIDS ON GRAIN DUST-INDUCED AIRWAY DISEASE  
John F. Trapp, Yankton, South Dakota; Janet L. Watt; Kathy L. Frees; Timothy J. Quinn; Matthew W. Nonnenmann; David A. Schwartz, Iowa City

514 TEMPORARY CORONARY ARTERY PROVISION CATHETER DURING MINIMALLY INvasive CORONARY SURGERY  
Alan S. Coulson; Shahroukh A. Bakhshay; Judy Quarnstrom; Phillip Spohn, Stockton, California

521 A 77-YEAR-OLD MAN WITH PROGRESSIVE DYSPNEA ON EXERTION  
John G. Weg, Ann Arbor, Michigan

523 BRANCHING PARENCHYMAL MASS  
P. Mark Logan, Halifax, Canada

525 PULMONARY OPACITIES AND GLOMERULONEPHRITIS IN A 15-YEAR-OLD BOY  
Andrew P. Fontenot, Denver; Constance A. Jennings, Toledo, Ohio; Talmadge E. King, Jr., San Francisco

528 THORACOSCOPIC SPLANCHNICOLYSIS FOR THE RELIEF OF CHRONIC PANCREATITIS PAIN: EXPERIENCE OF A GROUP OF PNEUMOLOGISTS  
Marc M. P. Noppen; Marc Meysman; Jan D. Haese; Walter G. Vincken, Brussels, Belgium

531 SELF-INFECTED INTRAMYOCARDIAL INJURY WITH A SEWING NEEDLE: A RARE CAUSE OF PNEUMOTHORAX  
Francis P. Jamilla; Larry C. Casey, Chicago

534 LUNG TRANSPLANTATION FOR WILLIAMS-CAMPBELL SYNDROME  
Scott M. Palmer, Jr., Durham, North Carolina; Daniel T. Layish, Orlando, Florida; Peter S. Kusin; Tim Oury; Robert D. Davis; Victor F. Tapson, Durham, North Carolina

537 TRACHEAL BRONCHUS: A CAUSE OF PROLONGED ATELECTASIS IN INTUBATED CHILDREN  
Brian P. O'Sullivan; Joseph J. Frassica; Shawn M. Rayder, Worcester, Massachusetts

540 VOCAL CORD DYSFUNCTION ASSOCIATED WITH EXERCISE IN ADOLESCENT GIRLS  
Sohail Kayani; Daniel C. Shannon, Boston

542 PULMONARY MYCOBACTERIUM AVIUM COMPLEX DISEASE WITHOUT DISSEMINATION IN HIV-INFECTED PATIENTS  
Laurent Hocqueloux; Philippe Lesprit; Jean-Louis Hermann; Arnaud La Blanchardiere; Anne-Marie Zagdanski; Jean-Marie Decazes; Jacques Modai, Paris, France

548 EOSINGOPHILIC LUNG DISEASE INDUCED BY BICALUTAMIDE: A CASE REPORT AND REVIEW OF THE LITERATURE  
Philip W. Wong; Nicholas Macris; Larry Difabrizio, New York; Nathan S. Seriff, Leonia, New Jersey

550 ARDS ASSOCIATED WITH TUMOR LYSIS SYNDROME IN A PATIENT WITH NON-HODGKIN'S LYMPHOMA  
John P. Moreno, Boston; Angela Nervi, Lebanon, New Hampshire; Alexander C. White, Boston

552 RIGHT VENTRICULAR ANEURYSM ASSOCIATED WITH ADVANCED HYPERTROPHIC CARDIOMYOPATHY  
Andrea Frustaci; Cristina Chimenti; Luigi Natale, Rome, Italy

555 PRIMARY LEIOMYOSARCOMA OF THE PULMONARY ARTERY CONFIRMED BY CATHERETER SUCTION BIOPSY  
Norikazu Yamada; Shigeru Kamei; Fuyuhiko Yasuda, Mie, Japan; Naoki Isaka; Isao Yada, Tsu, Japan; Takeshi Nakano, Tsu Mie, Japan

557 LUNG CANCER SCREENING DOES NOT FAVORABLY AFFECT OUTCOME  
Jerome M. Reich, Portland, Oregon

558 MORE INFORMATION ON INFECTION AND INFARCTION  
David H. Spodick, Worcester, Massachusetts

558 THE ETHICS SOAP NOTE  
Robert S. Crisman, Pawtucket, Rhode Island

559 LIMITATIONS OF ECG IN DIAGNOSING PULMONARY EMBOLISM  
Stefano Petruzzelli; Antonio Palla; Carlo Giuntini, Pisa, Italy  
Response—Emile Ferrari, Nice, France

559 CORTICOSTEROID THERAPY AND RELAPSE IN SARCOIDOSIS  
Jerome M. Reich, Portland, Oregon  
Response—Jonathan E. Gottlieb, Philadelphia

561 PREDICTIVE VALUE OF PCO<sub>2</sub> GAP IN INFANTS  
Charles D. Gomersall; Gavin M. Joynt, Shatin, Hong Kong PRC  
Response—Trevor Duke, Victoria, Australia

562 THE LUNG SCAN APPEARANCES OF TUMOR EMBOLIZATION  
Paul Eggermeyer, Christchurch, New Zealand  
Response—Lisa K. Moores, Washington, DC

563 PULMONARY ALVEOLAR PROTEINOSIS: LUNG TRANSPLANT OR BONE MARROW TRANSPLANT?  
Sean P. Gaine, Baltimore; Aengus O' Marcaigh, San Francisco

564 ERRATA  
Ramona Mayer, Graz, Austria  
James K. Stoller, Cleveland

## NUMBER 2, FEBRUARY, 1998 SUPPLEMENT

123S BACKGROUND  
124S INTRODUCTION: NLHEP  
126S DEFINITIONS  
127S PATHOPHYSIOLOGY/RISK FACTORS  
129S MAGNITUDE OF THE PROBLEM AND SOCIO-ECONOMIC DIFFERENCES  
134S NATURAL HISTORY  
136S DIFFERENTIAL DIAGNOSIS: SIGNS; SPIROMETRY; CHEST RADIOGRAPHS  
142S PREVENTION: SCREENING FOR EARLY DIAGNOSIS; SMOKING PREVENTION; COST BENEFIT ANALYSIS; PREVENTIVE APPROACHES; REHABILITATION  
145S PHYSICIAN-PATIENT PARTNERSHIP THROUGH EDUCATION AND MANAGEMENT  
147S CLINICAL MANAGEMENT: VACCINES; BRONCHOACTIVE DRUGS; STRATEGIC DRUGS; COR PULMONALE; OXYGEN  
153S NLHEP AND THE PRIMARY HEALTH PROVIDER  
154S INDICATIONS FOR CONSULTATION WITH A PULMONOLOGIST  
155S ANNOTATED REFERENCES

## NUMBER 3, MARCH, 1998

565 FUNDING FOR BIOMEDICAL RESEARCH: WHAT HAPPENED TO OUR SHARE OF NATION'S WEALTH?  
Jawahar Mehta, Gainesville, Florida

566 WHAT HAPPENS IN THE DEAD SEA?  
Vu-Dinh Minh, Santa Ana, California

567 RIGHT VENTRICULAR FUNCTION IN COPD: CAN IT BE ASSESSED RELIABLY BY THE MEASUREMENT OF RIGHT VENTRICULAR EJECTION FRACTION?  
Emmanuel Weitzenblum; Ari Chaouat, Strasbourg, France

569 STAFFING ICUS: THE GOOD NEWS AND THE NOT-SO-GOOD NEWS  
Paul G. Barash, Orange, Connecticut; Stanley Rosenbaum, New Haven, Connecticut

571 REHABILITATION OF HYPOXEMIC PATIENTS WITH COPD AT HIGH ALTITUDE AT THE DEAD SEA, THE LOWEST PLACE ON EARTH

Mordechai R. Kramer; Chaim Springer; Neville Berkman; Mendel Glazer; Milli Bubli; Ephraim Bar-Yishay; Dov Effron; Simon Godfrey, Jerusalem, Israel

**576 RIGHT AND LEFT VENTRICULAR DYSFUNCTION IN PATIENTS WITH SEVERE PULMONARY DISEASE**  
Carmine Dario Vizza, Rome, Italy; John P. Lynch; Laura L. Ochoa; Gregory Richardson; Elbert P. Trulock, St. Louis

**584 SHORT-TERM GROWTH IN ASTHMATIC CHILDREN USING FLUTICASONE PROPIONATE**  
Martin J. Visser; Wim M. C. van Aalderen; Barbara M. Elliott; Roelof J. Odink; Paul LP Brand, Groningen, the Netherlands

**587 PERCEPTION OF THE ROLE AND POTENTIAL SIDE EFFECTS OF INHALED CORTICOSTEROIDS AMONG ASTHMATIC PATIENTS**  
Louis Philippe Boulet, Ste Foy, Quebec, Canada

**593 THERAPEUTIC RESPONSE PATTERNS TO HIGH AND CUMULATIVE DOSES OF SALBUTAMOL IN ACUTE SEVERE ASTHMA**  
Carlos Rodrigo; Gustavo Rodrigo, Montevideo, Uruguay

**599 THE EFFECTS OF BODY COMPOSITION CHANGES TO OBSERVED IMPROVEMENTS IN CARDIOPULMONARY PARAMETERS AFTER EXERCISE TRAINING WITH CARDIAC REHABILITATION**  
Richard V. Milani; Carl J. Lavie, Jr., New Orleans

**602 COMPARISON OF PULMONARY GAS EXCHANGE MEASUREMENTS BETWEEN INCREMENTAL AND CONSTANT WORK EXERCISE ABOVE THE ANAEROBIC THRESHOLD**  
R. Jorge Zeballos; Isidre M. Weissman; Sean M. Connery, El Paso, Texas

**612 INTERPRETIVE ALGORITHMS FOR THE SYMPTOM-LIMITED EXERCISE TEST: ASSESSING DYSPNEA IN PERSIAN GULF WAR VETERANS**  
Ann Elizabeth Medinger, Chevy Chase, Maryland; Tet Wei Chan, Laurel, Maryland; Aram Arabian; Prashant K. Rohatgi, Washington, DC

**619 VALIDATION OF A NEW DYSPNEA MEASURE: THE UCSD SHORTNESS OF BREATH QUESTIONNAIRE**  
Elizabeth G. Eakin; Pamela M. Resnickoff; Lea M. Prewitt; Andrew L. Ries, San Diego; Robert M. Kaplan, La Jolla, California

**625 EVALUATION OF DYSPNEA DURING PHYSICAL AND SPEECH ACTIVITIES IN PATIENTS WITH PULMONARY DISEASES**  
Linda Lee; Marc Friesen; Ida R. Lambert; Robert G. Loudon, Cincinnati

**633 PREDICTORS OF QUALITY OF LIFE AND ADJUSTMENT AFTER LUNG TRANSPLANTATION**  
Lorenzo Cohen, Houston; Christine Littlefield; Paul Kelly, Toronto, Canada; Janet R. Maurer, Cleveland; Susan Abbey, Toronto, Canada

**645 EARLY RELEASE OF PROINFLAMMATORY CYTOKINES AFTER LUNG TRANSPLANTATION**  
Hervé Mai; Monique Dehoux; Charles Sleiman; Jorge Boczkowski; Guy Leseche; René Pariente; Michel Fournier, Clichy, France

**652 RATE OF FEV<sub>1</sub> CHANGE FOLLOWING LUNG VOLUME REDUCTION SURGERY**  
Matthew Brenner, Orange, California; Robert J. McKenna, Los Angeles; Arthur F. Gelb, Lakewood, California; Richard J. Fischel; Archie F. Wilson, Orange, California

**660 PATHOLOGIC FINDINGS IN LUNG VOLUME REDUCTION SURGERY**  
Ignacio G. Duarte, Decatur, Georgia; Anthony A. Gal; Kamal A. Mansour, Atlanta; Robert B. Lee, Jackson, Mississippi; Joseph I. Miller, Atlanta

**665 ASSOCIATION BETWEEN RIGHT VENTRICULAR FUNCTION AND PERfusion ABNORMALITIES IN HEMODYNAMICALLY STABLE PATIENTS WITH ACUTE PULMONARY EMBOLISM**  
Rachel L. Miller; Sam Das, New York; Thiruvadanai Anandaraman, West Orange, New Jersey; David W. Leibowitz; Philip O. Alderson; Byron M. Thomashow; Shunichi Homma, New York

**671 USE OF TRANSESOPHAGEAL ECHOCARDIOGRAPHY TO PREDICT SIGNIFICANT CORONARY ARTERY DISEASE IN AORTIC STENOSIS**  
Christophe Tribouilloy; Marcel Peltier; Jean-Luc Rey; Vicente Ruiz; Jean-Philippe Lesbire, Amiens, France

**676 CORONARY BYPASS GRAFTING FOR SINGLE-VESSEL CORONARY ARTERY DISEASE:**

A 17-YEAR REVIEW WITH SHORT- AND LONG-TERM FOLLOW-UP  
Douglas Baldwin, Minneapolis; Mark S. Slaughter, Oak Lawn, Illinois; Soon Park; Edward O. McFall; Herbert B. Ward, Minneapolis

**681 THE INFLUENCE OF PERIOPERATIVE MYOCARDIAL INFARCTION ON LONG-TERM PROGNOSIS FOLLOWING ELECTIVE VASCULAR SURGERY**  
Edward O. McFall; Herbert B. Ward; Steven Santilli; Marge Scheftel; Elliot Chesler; Kathie M. Dolisny, Minneapolis

**687 PREOPERATIVE BRONCHOSCOPIC ASSESSMENT OF AIRWAY INVASION BY ESOPHAGEAL CANCER: A PROSPECTIVE STUDY**  
Martin Riedel; Rainer W. Hauck; Hubert J. Stein; Leonard Mounayam; Christian Schulz; Albert Schormig; Jorg R. Siewert, München, Germany

**696 LOCALIZATION OF BRONCHIAL INTRAEPITHELIAL NEOPLASTIC LESIONS BY FLUORESCENCE BRONCHOSCOPY**  
Stephen C.T. Lam, Vancouver, Canada; Timothy C. Kennedy, Denver; Michael Unger, Philadelphia; York E. Miller, Denver; David M. Gelmont, Los Angeles; Valerie W. Rusch, New York; Bruce T. Gipe, Marina Del Rey, California; David Howard; Joan C. LeRiche; Andrew Coldman, Vancouver, Canada; Adi F. Gazdar, Bethesda, Maryland

**703 IMPORTANCE OF INTRAPULMONARY LYMPH NODES IN THE DIFFERENTIAL DIAGNOSIS OF SMALL PULMONARY NODULAR SHADOWS**  
Hiroyasu Yokomise; Hiroshi Mizuno; Osamu Iike; Hiromi Wada; Shigeaki Hitomi; Harumi Itoh, Kyoto, Japan

**707 THE EFFECT OF A MANDIBULAR ADVANCEMENT DEVICE ON APNEAS AND SLEEP IN PATIENTS WITH OBSTRUCTIVE SLEEP APNEA**  
Marie Marklund; Karl Franklin; Carin Sahlén; Karl Rune Lundgren, Umeå, Sweden

**714 USE OF CONVENTIONAL AND SELF-ADJUSTING NASAL CONTINUOUS POSITIVE AIRWAY PRESSURE FOR TREATMENT OF SEVERE OBSTRUCTIVE SLEEP APNEA SYNDROME: A COMPARATIVE STUDY**  
Martin Konermann, Kassel, Germany; Bernd M. Sanner; Martin Vyela; Frank Laschewski; Juergen Groetz; Alexander Sturm; Walter Zidek, Herne, Germany

**719 HOUR-TO-HOUR VARIABILITY OF OXYGEN SATURATION IN SLEEP APNEA**  
Bushir A. Chaudhary; Salman Dasti; Yong Park; Terry Brown; Harry Davis; Bushra Akhtar, Augusta, Georgia

**723 FACTORS PREDICTIVE OF SURVIVAL AMONG 337 PATIENTS WITH MESOTHELIOMA TREATED BETWEEN 1984 AND 1994 BY THE CANCER AND LEUKEMIA GROUP B**  
James Herndon, Durham, North Carolina; Mark R. Green, San Diego; A Philippe Chahinian, New York; Joseph A. Corson, Boston; Yasunosuke Suzuki, New York; Nicholas J. Vogelzang, Chicago

**732 THORACIC EMPYEMA IN HIV-INFECTED PATIENTS: MICROBIOLOGY, MANAGEMENT, AND OUTCOME**  
Jacinto Hernández Borge, Badajoz, Spain; Inmaculada Alfageme Michavila; Jesús Muñoz Méndez; Francisco Peña Campos Rodríguez; Nicolás Peña Grifán; Rafael Villagómez Cerrato, Seville, Spain

**739 VIDEO-ASSISTED TALC PLEURODESIS FOR MALIGNANT PLEURAL EFFUSIONS UTILIZING LOCAL ANESTHESIA AND IV SEDATION**  
Christopher A. Danby, Washington, DC; Samuel A. Adebonjo, Dayton, Ohio; Dennis M. Montz, Washington, DC

**743 EMERGENCY DEPARTMENT CARDIOPULMONARY BYPASS IN THE TREATMENT OF HUMAN CARDIAC ARREST**  
Gerard B. Martin, Grosse Pointe Park, Michigan; Emanuel P. Rivers, Detroit; Norman A. Paradis, New York; Mark G. Goetting; Daniel C. Morris; Richard M. Nowak, Detroit

**752 NURSING STAFF IN INTENSIVE CARE IN EUROPE: THE MISMATCH BETWEEN PLANNING AND PRACTICE**  
Rui Moreno, Cascais, Portugal; Dinis Reis Miranda, Groningen, the Netherlands

**759 A RANDOMIZED CLINICAL TRIAL COMPARING AN EXTENDED-USE HYGROSCOPIC CONDENSER HUMIDIFIER WITH HEATED-WATER HUMIDIFICATION IN MECHANICALLY VENTILATED PATIENTS**

**768 TRANSCUTANEOUS PCO<sub>2</sub> TO MONITOR NON-INVASIVE MECHANICAL VENTILATION IN ADULTS: ASSESSMENT OF A NEW TRANSCUTANEOUS PCO<sub>2</sub> DEVICE**  
Jean-Paul Janssens; Claude Howarth-Frey; Jean-Claude Chevrolet; Bianca Abajo; Thierry R. Rochat, Geneva, Switzerland

**774 THE EFFECT OF PHYSIOLOGIC AND MECHANICAL AGING ON THE PERFORMANCE OF PEAK FLOWMETERS**  
David P. Johns; Eleonora Side, Victoria, Australia; Adrian H. Kendrick, Bristol, United Kingdom; Trevor J. Williams, Victoria, Australia; Eugene H. Walters, Melbourne, Australia

**780 PATTERNS OF DISSIMILARITIES AMONG INSTRUMENT MODELS IN MEASURING PCO<sub>2</sub>, PCO<sub>2</sub>, AND PH IN BLOOD GAS LABORATORIES**  
James E. Hansen; Richard Casaburi, Torrance, California

**788 ELEVATED PLEURAL FLUID LEVELS OF DEFENSINS IN PATIENTS WITH EMPYEMA**  
Jun-ichi Asahita; Hiroshi Mukae; Masamitsu Nakazato; Haruko Taniguchi, Miyazaki, Japan; Kazuhiko Ogawa; Shigeru Kohno, Nagasaki, Japan; Shigeru Matsukura, Miyazaki, Japan

**795 COMPARISONS OF PLEURODESIS INDUCED BY TALC WITH OR WITHOUT THYMOL IODIDE IN RABBITS**  
Canmiao Xie, Guangzhou, Peoples Rep of China; Jeffrey McGovern, Long Beach, California; Wen-Chou Wu, Anaheim, California; Nai-San Wang, Irvine, California; Richard W. Light, Nashville, Tennessee

**800 A REVIEW OF WHY AND HOW WE MAY USE  $\beta$ -BLOCKERS IN CONGESTIVE HEART FAILURE**  
Jules Constant, Buffalo, New York

**809 ROLE OF DOBUTAMINE STRESS ECHOCARDIOGRAPHY IN HEART TRANSPLANT PATIENTS**  
Kwame Akosah; Pramod K. Mohanty, Richmond, Virginia

**816 EFFECTS OF SAMPLING INTERVAL ON PEAK OXYGEN CONSUMPTION IN PATIENTS EVALUATED FOR HEART TRANSPLANTATION**  
Jeffrey S. Johnson; Joseph J. Carlson; Ronald L. VanderLaan, Grand Rapids, Michigan; David Langholz, Maywood, Illinois

**820 THE ROLE OF RADIOLOGIC IMAGING IN DIAGNOSING COMPLICATIONS OF VIDEO-ASSISTED THORACOSCOPIC SURGERY**  
Andrew C. Mason, Vancouver, Canada; Mark J. Krasna; Charles S. White, Baltimore

**826 A PATIENT WITH NEWLY DIAGNOSED MELANOMA AND PULMONARY NODULES**  
Ernst-Gilbert Schreiber; Jeremy John Erasmus, Durham, North Carolina; Holman Page McAdams, Holon, Israel

**830 ACUTE DYSPNEA AND HYPOXIA IN A 37-YEAR-OLD WOMAN WITH SARCOIDOSIS**  
Peter Mazzone; Alejandro C. Arroliga, Cleveland

**834 RAPIDLY PROGRESSIVE EXTENSIVE SUBCUTANEOUS EMPHYSEMA ASSOCIATED WITH AN IMPLANTABLE INTRATRACHEAL OXYGEN CATHETER**  
Griffith M. Blackmon, Seattle; Martin C. Johnson II, Salem, Oregon; Elizabeth Plotkin, Seattle

**836 SUCCESSFUL TREATMENT OF WEGENER'S GRANULOMATOSIS DURING PREGNANCY: A CASE REPORT AND REVIEW OF THE MEDICAL LITERATURE**  
Edward S. Dayoan; Luis L. Dimen, Pasadena, California; Carl Thomas Boylen, Malibu, California

**838 PATIENT-INDUCED COMPLICATIONS OF A HEIMLICH FLUTTER VALVE**  
Helen L. Crocker; Richard E. Ruffin, Woodville, Australia

**839 PSEUDOMESOTHELIOMATOUS ADENOCARCINOMA OF THE LUNG IN A PATIENT WITH HIV INFECTION**  
Stephanie R. Schreiner; Beth D. Kirkpatrick; Frederic B. Askin, Baltimore

**841 ORBITAL HERNIATION ASSOCIATED WITH NONINVASIVE POSITIVE PRESSURE VENTILATION**  
Daniel Lazowick; Thomas J. Meyer; Mark R. Pressman; Donald D. Peterson, Wynnewood, Pennsylvania

844 PROPHYLAXIS FOR DEEP VENOUS THROMBOSIS: THE ACCP ANTITHROMBOTIC STATEMENT, REVISITED  
Victor F. Tapson, Durham, North Carolina

844 PATIENT-CENTERED VENTILATION  
Robert S. Crausman, Pawtucket, Rhode Island

845 TREATMENT OF LEGIONELLA LUNG ABSCESS: UNANSWERED QUESTIONS?  
John N. Morley; Lou Crocker Smith, Albany, New York

845 NONSPECIFIC AIRWAY HYPERRESPONSIVENESS IN HIV DISEASE  
Eusebi Chiner; Carlos H. Larramendi; Jose Luis Calpe; Maria Teresa Puigcerver, Alicante, Spain  
Response—Jeanne M. Wallace, Sylmar, California; Donald P. Tashkin, Los Angeles

847 USEFULNESS OF THE FLOW VOLUME LOOP  
Chris T. Bolger, Basel, Switzerland  
Response—Kalpathi K. Guntupalli, Houston; William Lee Eschenbacher, Morgantown, West Virginia

848 AMIODARONE-INDUCED ADVERSE EFFECTS AT THE BEGINNING OF ORAL THERAPY: CLINICAL IMPLICATIONS  
Armando Gardini; Antonio D'Alota; Pompilio Faggiano, Brescia, Italy  
Response—Stephen L. Winters; R. Gregory Sachs; Jay H. Curwin, Morristown, New Jersey  
Response—Iftamar Goldstein, Tel Aviv, Israel

849 URINE THROMBOMODULIN IN PATIENTS WITH IDIOPATHIC PULMONARY FIBROSIS  
Mari Iguchi, Tokyo, Japan; Hajime Goto, Kanagawa-ken, Japan; Makoto Goto; Hiroyuki Shinno, Tokyo, Japan

849 AIRWAY OBSTRUCTION WITH PERCUTANEOUS TRACHEOSTOMY  
Pasquale Cagliari, Utica, New York

850 MORE ON AIRWAY OBSTRUCTION WITH PERCUTANEOUS TRACHEOSTOMY  
Mark J. Rumbak, Tampa, Florida

850 T-WAVE INVERSION IN PULMONARY EMBOLISM  
George Nikolic, Woden, Australia

851 ASTHMA THERAPY CLARIFIED  
Robert P. Baker, Westborough, Massachusetts  
Response—John W. Georgitis, Winston-Salem, North Carolina

851 PULMONARY HYPERTENSION AND LEUKEMIA  
Susan Murin, Davis, California  
Response—Leonard J. Rosoff, New Hyde Park, New York

852 CHRONIC NECROTIZING PULMONARY ASPERGILLIOSIS: APPROACH TO MANAGEMENT  
William E. Caras, Tacoma, Washington  
Response—Douglas B. Schwartz, Albany, New York; Joseph L. Saraceno, Schenectady, New York

853 MEASURING NEBULIZER OUTPUT  
Jeremy R. Beach, Birmingham, United Kingdom  
Response—Gerald C. Smaldone, Stony Brook, New York

853 PATIENT SELECTION FOR PULMONARY ARTERY CATHETERIZATION  
Jeffrey M. Rothschild, Pittsburgh

**NUMBER 3, MARCH, 1998  
SUPPLEMENT**

1655 INTRODUCTION: DISEASE MANAGEMENT OF PULMONARY INFECTIONS  
Michael S. Niederman, Mineola, New York

1665 DO CLINICAL PRACTICE GUIDELINES DEFINE GOOD MEDICAL CARE? THE NEED FOR GOOD SCIENCE AND THE DISCLOSURE OF UNCERTAINTY WHEN DEFINING 'BEST PRACTICES'  
Steven Woolf, Fairfax, Virginia

1725 DOES EVIDENCE-BASED MEDICINE HELP THE DEVELOPMENT OF CLINICAL PRACTICE GUIDELINES?  
John E. Heffner, Phoenix

1795 COMMUNITY-ACQUIRED PNEUMONIA: A NORTH AMERICAN PERSPECTIVE  
Michael S. Niederman, Mineola, New York

1835 COMMUNITY-ACQUIRED PNEUMONIA GUIDELINES—AN INTERNATIONAL COMPARISON: A VIEW FROM EUROPE  
Mark Woodhead, Manchester, UK

1885 NOSOCOMIAL PNEUMONIA GUIDELINES: AN INTERNATIONAL PERSPECTIVE

1945 PREVENTING MISMANAGEMENT OF COMMUNITY-ACQUIRED PNEUMONIA AT AN URBAN PUBLIC HOSPITAL: IMPLICATIONS FOR INSTITUTION-SPECIFIC PRACTICE GUIDELINES  
Lionel A. Mandell, Hamilton, Ontario, Canada; G. Douglas Campbell, Shreveport, Louisiana

1995 ACUTE EXACERBATIONS OF CHRONIC BRONCHITIS: AN INTERNATIONAL COMPARISON  
Peter Ball, Fife, UK; Barry J. Make, Denver

2055 HOW DO WE ACHIEVE COST-EFFECTIVE OPTIONS IN LOWER RESPIRATORY TRACT INFECTION THERAPY?  
Ronald F. Grossman, Toronto, Ontario, Canada

2115 SEQUENTIAL SWITCH THERAPY FOR LOWER RESPIRATORY TRACT INFECTIONS: A EUROPEAN PERSPECTIVE  
Dilip Nathwani, Dundee, United Kingdom

2195 DIAGNOSIS OF LOWER RESPIRATORY TRACT INFECTIONS: WHAT WE HAVE AND WHAT WOULD BE NICE  
Robert P. Baumgartner, Cincinnati; Chiara E. Condaro, St. Louis

2245 CYTOKINE MODIFIERS: PIPE DREAM OR REALITY  
Edward Abraham, Denver

2285 STRATEGIES AND OPTIONS FOR MINIMIZING RESISTANCE EMERGENCE IN PULMONARY INFECTIONS  
Sebastian G.B. Amyes, Edinburgh, United Kingdom

**NUMBER 4, APRIL, 1998**

855 OPINIONS/HYPOTHESES: A NEW DEPARTMENT IN CHEST  
A. Jay Block, Gainesville, Florida

855 MECHANISMS OF ACUTE EPICARDIAL AND MYOCARDIAL INJURY IN PERICARDIAL DISEASE  
David H. Spodick, Worcester, Massachusetts

856 PREOPERATIVE SMOKING REDUCTION: ALL OR NOTHING AT ALL?  
Glen A. Lillington, Menlo Park, California; David P. L. Sachs, Palo Alto, California

858 USE OF THE BREATHING RESERVE TO INTERPRET SUBMAXIMAL EXERCISE RESPONSES  
Donald A. Mahler, Lebanon, New Hampshire

859 IT'S NOT "JUST A VIRUS" ANYMORE  
Marc A. Judson, Charleston, South Carolina

861 THE ACUTE EFFECT OF MINOCYCLINE ON THE PERICARDIUM: EXPERIMENTAL AND CLINICAL FINDINGS  
Walter Markiewicz; Ilan Lashevsky; Diana Rinkevich; Uri Teitelman; Shimon A. Reisner, Haifa, Israel

867 NORMAL LEFT VENTRICULAR EJECTION FRACTION IN OLDER PERSONS WITH CONGESTIVE HEART FAILURE  
Wilbert S. Aronow; Chul Ahn, Bronx, New York; Itzhak Kronzon, New York

870 LEFT VENTRICULAR-ARTERIAL SYSTEM COUPLING AT PEAK EXERCISE IN DILATED NONISCHEMIC CARDIOMYOPATHY  
Alain Cohen-Solal, Clichy, France; Marc Faraggi, Paris, France; Daniel Czitrom, Clichy, France; Dominique Le Guludec; Nicolas Delahaye, Paris, France; Rene Gourgon, Clichy, France

878 CORONARY ARTERY BYPASS GRAFTING IN PATIENTS WITH COPD  
Louis E. Samuels; Maria S. Kaufman; Rohinton J. Morris, Philadelphia; Robert A. Promislow, Wynnewood, Pennsylvania; Stanley K. Brockman, Philadelphia

883 PREOPERATIVE SMOKING HABITS AND POSTOPERATIVE PULMONARY COMPLICATIONS  
Leslie G. Bluman, Durham, North Carolina; Lori Mosca, Ann Arbor, Michigan; Nancy Newman; David G. Simon, Syracuse, New York

890 COMPARISON OF SHORT-TERM FUNCTIONAL OUTCOMES FOLLOWING UNILATERAL AND BILATERAL LUNG VOLUME REDUCTION SURGERY

896 LUNG VOLUME REDUCTION SURGERY: AN ANALYSIS OF HOSPITAL COSTS  
Ellen H. Elpern; Kathleen G. Behner; Bryce Klotz; William H. Warren; Peter Szidon; Steven Kesten, Chicago

900 IMPAIRED SKELETAL MUSCLE ENDURANCE RELATED TO PHYSICAL INACTIVITY AND ALTERED LUNG FUNCTION IN COPD PATIENTS  
Isabelle Serres; Veronique Gautier; Alain L. Varray; Christian G. Prefaut, Montpellier, France

906 AEROBIC ENDURANCE TRAINING PROGRAM IMPROVES EXERCISE PERFORMANCE IN LUNG TRANSPLANT RECIPIENTS  
Leopold Steibellehner; Michael Quittan; Adelheid End; Georg Wiesenthaler; Walter Klepetko; Paul Haber; Otto Chris Burghuber, Vienna, Austria

913 BREATHING RESERVE AT THE LACTATE THRESHOLD TO DIFFERENTIATE A PULMONARY MECHANICAL FROM CARDIOVASCULAR LIMIT TO EXERCISE  
Benjamin D. Medoff; David A. Oelberg; David J. Kanarek; David M. Systrom, Boston, Massachusetts

919 CYTOMEGALOVIRUS PNEUMONIA IN AIDS PATIENTS: VALUE OF CYTOMEGALOVIRUS CULTURE FROM BAL FLUID AND CORRELATION WITH LUNG DISEASE  
Caterina Uberti-Foppa; Flavia Lillo; Maria R. Terreni; Armando Puglisi; Monica Guffanti; Nicola Gianotti; Adriano Lazzarin, Milan, Italy

924 CYTOMEGALOVIRUS VIREMIA IN LUNG TRANSPLANT RECIPIENTS RECEIVING GANCICLOVIR AND IMMUNE GLOBULIN  
Carlos A. Gutierrez; Cecilia Chaparro; Mel Krajden; Timothy L. Winton, Toronto, Canada; Steven Kesten, Chicago

933 PULMONARY TUBERCULOSIS TREATED WITH DIRECTLY OBSERVED THERAPY: SERIAL CHANGES IN LUNG STRUCTURE AND FUNCTION  
Richard Long, Edmonton, Canada; Bruce Maycher, Winnipeg, Canada; Anil Dhar, Thunder Bay, Canada; Jure Manfreda; Earl S. Hershfield; Nicholas R. Anthonisen, Winnipeg, Canada

944 COMMUNITY RESPIRATORY VIRAL INFECTION IN ADULT LUNG TRANSPLANT RECIPIENTS  
Scott M. Palmer, Jr.; Nancy G. Henshaw; David N. Howell; Sara E. Miller; Robert D. Davis; Victor F. Tapson, Durham, North Carolina

951 A COMPARISON OF THE AVAILABILITY OF TOBRAMYCIN FOR INHALATION FROM VENTED VS UNVENTED NEBULIZERS  
Allan L. Coates, Toronto, Canada; Clair F. MacNeish; Larry C. Lands, Montreal, Canada; Dale Meissner, Dorval, Canada; Susan Kelemen, Montreal, Canada; Elizabeth Badas, Dorval, Canada

957 LUNG DEPOSITION OF FENOLOTEROL AND FLUNISOLIDE DELIVERED USING A NOVEL DEVICE FOR INHALED MEDICINES: COMPARISON OF RESPIMAT WITH CONVENTIONAL METERED-DOSE INHALERS WITH AND WITHOUT SPACER DEVICES  
Steve P. Newman, Nottingham, England; Joanne Brown; Karen P. Steed; Sandra J. Reader, Bracknell, United Kingdom; Heinrich Kladders, Ingelheim, Germany

964 IS NORMAL BRONCHIAL RESPONSIVENESS IN ASTHMATICS A RELIABLE INDEX FOR WITHDRAWING INHALED CORTICOSTEROID TREATMENT?  
Alessandra Marabini; Giuseppe Cardinalini; Carla Severini; Antonio Ripandelli; Andrea Siracusano, Perugia, Italy

968 COMPLIANCE WITH PEAK EXPIRATORY FLOW MONITORING IN HOME MANAGEMENT OF ASTHMA  
Johanne L. Cote, Ste Foy, Canada; Andre Cartier; Jean Luc Malo, Montreal, Canada; Michel Y. Rouleau, Quebec, Canada; Louis-Philippe Boulet, Ste Foy, Canada

973 LONGITUDINAL DETERMINANTS OF BRONCHIAL RESPONSIVENESS TO INHALED HIS-TAMINE  
Charlotte Suppli Ulrik, Frederiksberg, Denmark; Vibeke Backer, Copenhagen, Denmark

980 THE RELATION BETWEEN MULTIPLE SLEEP LATENCY TEST FINDINGS AND THE FREQUENCY OF APNEIC EVENTS IN REM AND NON-REM SLEEP  
Ronald D. Chervin; Michael S. Aldrich, Ann Arbor, Michigan

985 ARTERIAL BLOOD PRESSURE RESPONSE TO TRANSIENT ARIOSALS FROM NREM SLEEP IN NONAPNEIC SNORERS WITH SLEEP FRAGMENTATION  
Frederic Lofaso; Françoise Goldenberg; Marie-Pia d'Orto; Andre Coste; Alain Hart, Creteil, France

992 THE EFFICACY OF ORAL APPLIANCES IN THE TREATMENT OF PERSISTENT SLEEP APNEA AFTER UVELOPALATOPHARYNGOPLASTY  
Richard P. Millman, Providence, Rhode Island; Cynthia Rosenberger, Cleveland; Carol C. Carlisle; Naomi R. Kramer, Providence, Rhode Island; Douglas M. Kahn, Pawtucket, Rhode Island; Alice E. Bonita, Providence, Rhode Island

997 ANALYSIS OF CELL TYPE AND RADIOGRAPHIC PRESENTATION AS PREDICTORS OF THE CLINICAL COURSE OF PATIENTS WITH BRONCHIOALVEOLAR CELL CARCINOMA  
Kurt H. Albertine, Salt Lake City, Utah; Robert M. Steiner, Philadelphia; Daniel M. Radack; Daniel M. Golding, Salt Lake City, Utah; Donald D. Peterson, Wynnewood, Pennsylvania; Herbert E. Cohn; John L. Farber, Philadelphia

1007 THORACOSCOPIC TALC PUDRAGE IN MALIGNANT PLEURAL EFFUSIONS: EFFECTIVE PLEURODESIS DESPITE LOW PLEURAL PH  
Yossef Aleyroff, Rancho Palos Verdes, California; Randel Robert King, Harbor City, California; Christian Boutin, Marseille, France

1013 THE ACUTE EFFECTS OF NASAL POSITIVE PRESSURE VENTILATION IN PATIENTS WITH ADVANCED CYSTIC FIBROSIS  
John T. Granton, Toronto, Canada; Steven Kesten, Chicago

1019 EFFECT OF HIGH-FREQUENCY ORAL AIRWAY AND CHEST WALL OSCILLATION AND CONVENTIONAL CHEST PHYSICAL THERAPY ON EXPECTORATION IN PATIENTS WITH STABLE CYSTIC FIBROSIS  
Thomas A. Scherer, Zurich, Switzerland; Jurg Barandun, Davos, Switzerland; Elena Martinez; Adam Wanner; Eben M. Rubin, Miami

1028 EFFECTS OF POSITIVE END-EXPIRATORY PRESSURE ON OSCILLATED FLOW RATE DURING HIGH-FREQUENCY CHEST COMPRESSION  
Ryan J. Perry; Godfrey C. W. Man; Richard L. Jones, Edmonton, Canada

1034 ABSENCE OF LEFT-SIDED PREDOMINANCE IN ASBESTOS-RELATED PLEURAL PLAQUES: A CT STUDY  
Jose C. Gallego, Ferrol, Spain

1037 TRANSBRONCHIAL LUNG BIOPSY: CAN SPECIMEN QUALITY BE PREDICTED AT THE TIME OF BIOPSY?  
Frederick J. Curley, Milford, Massachusetts; Jasbir S. Johal; Maura E. Burke; Armando E. Fraire, Worcester, Massachusetts

1042 USE OF A PULSE OXIMETER IN AN ADULT EMERGENCY DEPARTMENT: IMPACT ON THE NUMBER OF ARTERIAL BLOOD GAS ANALYSES ORDERED  
Genevieve Le Bourdelle; Philippe Estagnasie; Fabien Lenior; Patrick Brun; Didier Dreyfuss, Colombes, France

1048 RIGHT VENTRICULAR END-DIASTOLIC VOLUME AS A PREDICTOR OF THE HEMODYNAMIC RESPONSE TO A FLUID CHALLENGE  
John G. Wagner, Ann Arbor, Michigan; James W. Leatherman, Minneapolis

1055 SERUM CARDIAC TROPONIN T AS A PROGNOSTIC MARKER IN EARLY SEPSIS  
Claudia Spies; Volker Haude; Rudolf Fitzner; Klaus Schroeder; Maria Overbeck; Norbert Runke; Walter Schaffartzik, Berlin, Germany

1064 FAILURE OF SPLANCHNIC RESUSCITATION IN THE ACUTELY INJURED TRAUMA PATIENT CORRELATES WITH MULTIPLE ORGAN SYSTEM FAILURE AND LENGTH OF STAY IN THE ICU  
Orlando C. Kirton; Jimmy Windsor; Raymond Wedderburn; Judith Hudson-Civetta; David V. Shatz; Nicholas R. Mataragis, Miami; Joseph M. Civetta, Farmington, Connecticut

1070 REPRODUCIBILITY OF DOUBLE INDICATOR DILUTION MEASUREMENTS OF INTRATHO-

RACIC BLOOD VOLUME COMPARTMENTS, EXTRAVASCULAR LUNG WATER, AND LIVER FUNCTION  
Oliver Godje; Marcus Peyerl; Tobias Seebauer; Oliver Dewald; Bruno Reichart, Munich, Germany

1078 GASTRIC AND ESOPHAGEAL INTRAMUCOSAL  $\text{PCO}_2$  ( $\text{PiCO}_2$ ) DURING ENDOTOXEMIA: ASSESSMENT OF RAW  $\text{PiCO}_2$  VS  $\text{PaCO}_2$  GRADIENTS AS INDICATORS OF HYPOPERFUSION IN A CANINE MODEL OF SEPTIC SHOCK  
Jorge A. Guzman; Felix J. Lacoma; James A. Kruse, Detroit

1084 OPTIMIZING STANDARD CARDIOPULMONARY RESUSCITATION WITH AN INSPIRATORY IMPEDIMENT THRESHOLD VALVE  
Keith G. Lurie; Katherine M. Mulligan; Scott McNitt; Barry Detroy; Paul Lindstrom, Minneapolis; Karl H. Lindner, Ulm, Germany

1091 MICROSATELLITE INSTABILITY AND LOSS OF HETEROZYGOSITY AT CHROMOSOMES 9 AND 17 IN NON-SMALL CELL LUNG CANCER  
Marios E. Froudarakis, Saint-Etienne, France; George Sourvinos, Crete, Greece; Pierre Fourneau, Saint Etienne, France; Demosthenes E. Bourous, Heraklion, Greece; Jean Michel Vergnon, St Etienne, France; Demetrios A. Spanidou; Nikolaos M. Siakas, Crete, Greece

1095 LONG-ACTING INHALED  $\beta_2$ -AGONISTS IN ASTHMA THERAPY  
Robert H. Moore; Ayesha Khan; Burton F. Dickey, Houston

1109 THE NATURAL HISTORY AND RATE OF PROGRESSION OF AORTIC STENOSIS  
Steven J. Lester; Brett Heilbron; Kenneth Gin; Arthur Dodek; John Jue, Vancouver, Canada

1115 CONTROVERSIES SURROUNDING LONG-TERM ANTICOAGULATION OF VERY ELDERLY PATIENTS IN ATRIAL FIBRILLATION  
Joseph E. Marine; Samuel Z. Goldhaber, Boston

1119 ISCHEMIC HEART DISEASE WITH CONGESTIVE HEART FAILURE—PROBLEMS IN CLINICAL MANAGEMENT  
Morton E. Tavel, Indianapolis; Jeffrey Breall; Bernard J. Gersh, Washington, DC

1123 A MAN WITH DYSPNEA, PRODUCTIVE COUGH, AND CHEST RADIOGRAPH SHOWING HYPERINFLATION AND A DIFFUSE NODULAR PATTERN  
Marvin I. Schwarz, Denver

1125 HYPOXIC RESPIRATORY FAILURE IN A 30-YEAR-OLD SPELUNKER  
Peter G. Polos, Taunton, Massachusetts

1127 ACUTE PNEUMOPATHY IN A NONSURGICAL TRANSSEXUAL  
Tan Duong; Alvin J. Schonfeld; Margaret Yungbluth; Ross Slotkin, Vail, Colorado

1130 MASSIVE HEMOPTYSIS FROM A PULMONARY ARTERY ANEURYSM ASSOCIATED WITH AN EMPHYSEMATOUS BULLA  
Russell P. Bowler; Janette Durham; Marvin I. Schwarz, Denver

1132 VENOUS AND ARTERIAL GAS EMBOLISM ASSOCIATED WITH POSITIVE PRESSURE VENTILATION  
Lindell K. Weaver; Alan Morris, Salt Lake City, Utah

1134 ELEVATION OF PEAK EXPIRATORY FLOW BY A "SPITTING" MANEUVER: MEASURED WITH FIVE PEAK FLOWMETERS  
Valerie Strayhorn; Kenneth V. Leeper, Jr.; Elizabeth Tolley; Timothy H. Self, Memphis, Tennessee

1136 ARDS AND ADRENAL INSUFFICIENCY ASSOCIATED WITH THE ANTI-PHOSPHOLIPID ANTIBODY SYNDROME  
Angelo Argiento; Robert J. DiBenedetto, Savannah, Georgia

1138 CIRCUMFLY CORONARY ARTERY DISSECTION FOLLOWING WATERSKIING  
Jeffrey Greenberg; Michael Salinger; Frank Weschler; Brian Edelman; Randall Williams, Evanston, Illinois

1141 BOARD REVIEW COURSES FOR CRITICAL CARE MEDICINE  
Lawrence Martin, Cleveland  
Response—James K. Stoller, Cleveland; Alvin Lever, Northbrook, Illinois; Richard S. Irwin, Worcester, Massachusetts

1143 DECIPHERING HISTOPLASMOSIS, SYSTEMIC NONCASEATING GRANULOMA, AND SARCOIDOSIS IN THE LITERATURE  
Jerome M. Reich, Portland, Oregon

1143 FALSE-POSITIVE RESULTS OF CARCINOEMBYRONIC ANTIGEN IN PLEURAL EFFUSIONS  
Victoria Villena; Angel Lopez Encuentra; Francisco Pozo Rodriguez, Madrid, Spain

1144 TUMOR MARKERS IN SPUTUM OF PATIENTS WITH BRONCHIOALVEOLAR CARCINOMA  
Hatice Canan Hasanoglu, Malatya, Turkey; Zeki Yildirim, Ankara, Turkey; Munire Gokirmak, Malatya, Turkey

1145 INTRACAVITARY BLEOMYCIN VS INTERFERON IN THE MANAGEMENT OF MALIGNANT PLEURAL EFFUSIONS  
Sergio Sartori; Lucio Trevisani, Ferrara, Italy; Ingrid Nielsen; Davide Tassanini, Rimini, Italy; Vincenzo Abbasciano, Ferrara, Italy  
Response—Harry E. Wilkins, III, Tyler, Texas

1146 A CASE OF SYSTEMIC LUPUS ERYTHEMATOSUS OR HEPATITIS C VIRUS?  
Maurizio Marvisi, Cortemaggiore, Italy  
Response—Irawan Susanto; Jay I. Peters, San Antonio, Texas

1147 HEALTH-RELATED QUALITY OF LIFE: WHAT IS BEING MEASURED?  
Marjolaine M. Limbos; David P. Joyce, Toronto, Canada  
Response—Carry A. J. Ketelaars, Berg En Terblijt, the Netherlands

1148 EXERCISE TESTING IN PATIENTS WITH INTERSTITIAL LUNG DISEASE  
James E. Hansen; Karlman Wasserman, Torrance, California  
Response—Steven H. Kirtland; Richard H. Winzenbauer, Seattle  
Response—Robert Lodenkenper, Berlin, Germany

## NUMBER 4, APRIL, 1998 SUPPLEMENT

233S INTRODUCTION: MECHANISMS AND MANAGEMENT OF COPD: WE CAN DO BETTER—IT'S TIME FOR A RE-EVALUATION  
Michael S. Niederman, Mineola, New York

235S COPD: OVERVIEW OF DEFINITIONS, EPIDEMIOLOGY, AND FACTORS INFLUENCING ITS DEVELOPMENT  
Stephen I. Rennard, Omaha, Nebraska

242S THE ROLE OF INFECTION IN COPD  
Robert Wilson, London, England

249S THE VALUE OF ANTIBIOTICS AND THE OUTCOMES OF ANTIBIOTIC THERAPY IN EXACERBATIONS OF COPD  
Ronald F. Grossman, Toronto, Canada

256S SUPPORTIVE THERAPY IN COPD  
Thomas L. Petty, Denver

263S PULMONARY REHABILITATION  
Donald A. Mahler, Lebanon, New Hampshire

269S LUNG TRANSPLANTATION FOR COPD  
Elbert P. Trulock, St Louis

277S LUNG VOLUME REDUCTION SURGERY  
Alan M. Fein, Manhasset, New York

283S STANDARDS FOR THE OPTIMAL MANAGEMENT OF COPD: A SUMMARY  
Bartolome R. Celli, Boston

## NUMBER 5, MAY, 1998

1151 MY BROTHER, ED  
A. Jay Block, Gainesville, Florida

1151 RADIOFREQUENCY ABLATION FOR SLEEP-DISORDERED BREATHING  
Maj Daniel I. Loube, MC USA, Washington, DC

1153 A SCANDALOUS INCOMPETENCE...CONTINUED  
Lee B. Reichman, Newark, New Jersey

1154 SERUM CONCENTRATIONS OF THE ANTIMYCOBACTERIAL DRUGS  
Charles Peloquin, Denver

1155 PRESCRIPTION OF MACROLIDES IN COMMUNITY-AQUIRED PNEUMONIA: SCIENCE OR ART?  
Jordi Rello, Barcelona, Spain

1158 NEW MACROLIDES OR NEW QUINOLONES AS MONOTHERAPY FOR PATIENTS WITH COMMUNITY-AQUIRED PNEUMONIA: OUR CUP RUNNETH OVER?  
Victor L. Yu; Emanuel Vergis, Pittsburgh

1159 CYSTIC FIBROSIS: WHEN TO CONSIDER LUNG TRANSPLANTATION?  
Patrick A. Flume, Charleston, South Carolina

1161 URBAN AIR POLLUTION: WHY IS IT A HEALTH PROBLEM?

Richard E. Kanner, Salt Lake City, Utah

1163 RADIOFREQUENCY VOLUMETRIC TISSUE REDUCTION OF THE PALATE IN SUBJECTS WITH SLEEP-DISORDERED BREATHING  
Nelson Powell; Robert W. Riley; Robert J. Troell; Kasey Li; Marc B. Blumen; Christian Guilleminault, Palo Alto, California

1175 UNDERREADING OF THE TUBERCULIN SKIN TEST REACTION  
Edwin L. Kendig, Jr.; Barry V. Kirkpatrick; W. Hans Carter; Forrest Anne Hill; Kay Caldwell; Marielle Entwistle, Richmond, Virginia

1178 LOW SERUM ANTIMYCOBACTERIAL DRUG LEVELS IN NON-HIV-INFECTED TUBERCULOSIS PATIENTS  
Michael E. Kimerling; Penny Phillips; Patricia E. Patterson; Marilyn Hall; C. Andrew Robinson; Nancy E. Dunlap, Birmingham, Alabama

1184 EFFECTIVENESS OF A NOSOCOMIAL TUBERCULOSIS CONTROL PROGRAM AT AN URBAN TEACHING HOSPITAL  
Philip A. LoBue; Antonino Catanzaro, San Diego

1190 RAPID DIAGNOSIS OF TUBERCULOSIS IN VARIOUS BIOPSY AND BODY FLUID SPECIMENS BY THE AMPLICOR MYCOBACTERIUM TUBERCULOSIS POLYMERASE CHAIN REACTION TEST  
Sanjay P. Shah, Old Bridge, New Jersey; Albert Miller, Jamaica, New York; Anthony J. Mastelone, Oyster Bay, New York; Kyungmee P. Kim, Port Washington, New York; Peter Colaninno; Lisa Hochstein; Richard F. D'Amato, Jamaica, New York

1195 COMPARATIVE STUDY OF THE CLINICAL PRESENTATION OF LEGIONELLA PNEUMONIA AND OTHER COMMUNITY-ACQUIRED PNEUMONIAS  
Nieves Sopena; Miquel Sabria; Maria Lluisa Pedro-Botet; Eduardo Padilla; Josep Dominguez, Barcelona, Spain; Josep Moreira, Badalona, Spain; Pere Tudela, Barcelona, Spain

1201 IMPLICATIONS FOR MACROLIDE TREATMENT IN COMMUNITY-ACQUIRED PNEUMONIA  
Linda M. Mundy, St. Louis; David Oldach; Paul G. Auwaerter; Charlotte A. Gaydos; Richard D. Moore; John G. Bartlett; Thomas C. Quinn, Baltimore

1207 PNEUMOCOCCAL BACTEREMIA IN CHILDHOOD: A 6-YEAR EXPERIENCE IN A COMMUNITY HOSPITAL  
Balagangadhara R. Totapally, Miami; William T. Walsh, Flint, Michigan

1215 USE OF ADJUNCTIVE CORTICOSTEROIDS IN SEVERE ADULT NON-HIV PNEUMOCYSTIS CARINII PNEUMONIA  
Jaime Pareja; Robert Garland; Henry Koziel, Boston

1225 PULMONARY COMPLICATIONS OF HIV INFECTION: AUTOPSY FINDINGS  
Bekele Afessa, Jacksonville, Florida; William Green, Washington, DC; Joseph Chiao, Jacksonville, Florida; Winston R. Frederick, Washington, DC

1230 RISK OF DEATH IN CYSTIC FIBROSIS PATIENTS WITH SEVERELY COMPROMISED LUNG FUNCTION  
Carlos E. Milla; Warren J. Warwick, Minneapolis

1235 ALLOGRAFT COLONIZATION AND INFECTIONS WITH PSEUDOMONAS IN CYSTIC FIBROSIS LUNG TRANSPLANT RECIPIENTS  
David R. Nunley; Wayne F. Grunrich; Aldo T. Iacono; Samuel A. Yousen; N. Paul Ohori; Robert J. Keenan; James H. Dauber, Pittsburgh

1244 CAN CHEST CT DECREASE THE USE OF PRE-OPERATIVE BRONCHOSCOPY IN THE EVALUATION OF SUSPECTED BRONCHOGENIC CARCINOMA?  
Jose Fernando Aristizabal; K. Randall Young, Jr.; Hrudaya Nath, Birmingham, Alabama

1250 UTILITY OF CT SCAN EVALUATION FOR PREDICTING PULMONARY HYPERTENSION IN PATIENTS WITH PARENCHYMAL LUNG DISEASE  
Rana T. Tan, Bremerton, Washington; Ronald Kuzo; Lawrence R. Goodman; Ronald Siegel; George B. Haasler; Kenneth W. Presberg, Milwaukee

1257 RELATIONSHIP OF ALVEOLAR MACROPHAGE PLASMINOGEN ACTIVATOR AND ELASTASE ACTIVITIES TO LUNG FUNCTION AND CT EVIDENCE OF EMPHYSEMA  
Raja T. Abboud; Anwuli Felix Ofulue, Vancouver, Canada; Raul H. Sansores, Mexico, Mexico; Nestor L. Muller, Vancouver, Canada

1264 ORAL GLUCOCORTICOSTEROID-SPARING EFFECT OF BUDESONIDE ADMINISTERED BY TURBUHALER: A DOUBLE-BLIND, PLACEBO-CONTROLLED STUDY IN ADULTS WITH MODERATE-TO-SEVERE CHRONIC ASTHMA  
Harold S. Nelson, Denver; I. Leonard Bernstein, Cincinnati; Jordan N. Fink, Milwaukee; Thomas B. Edwards, Albany, New York; Sheldon L. Spector, Los Angeles; William W. Storms, Colorado Springs, Colorado; Donald P. Tashkin, Los Angeles

1272 SHORT-TERM CARDIOVASCULAR EFFECTS OF SALMETEROL  
Carmelindo M. E. Tranza, Catanzaro, Italy; Girolamo Pelizzetti; Rosa D. Grembiale; Saverio Naty, Reggio Calabria, Italy; Salvatore Durante; Genarino Borello, Catanzaro, Italy

1277 RACE, INCOME, URBANICITY, AND ASTHMA HOSPITALIZATION IN CALIFORNIA: A SMALL AREA ANALYSIS  
Nancy Fox Ray; Mae Thamer; Bahar Fadiliglioglu; Peter J. Gergen, Bethesda, Maryland

1285 RESPIRATORY COMPLICATIONS AFTER CORONARY ARTERY BYPASS SURGERY WITH UNILATERAL OR BILATERAL INTERNAL MAMMARY ARTERY GRAFTING  
Mano Daganiou; Ioanna Dimopoulou; Nickolaos Michalopoulos; Konstantinos Papadopoulos; Anna Karakatsani; Stephanos Geroulanos; George E. Tszepligkis, Athens, Greece

1290 SYSTEMIC INFLAMMATION PRESENT IN PATIENTS UNDERGOING CABG WITHOUT EXTRACORPOREAL CIRCULATION  
Erik Franssen; Jos Maessen; Mieke Dentener; Nicole Senden; Gisj G. Geskes; Wim Buurman, Maastricht, the Netherlands

1296 CLINICAL EVALUATION OF THE PHYSIO ANULOPLASTY RING  
Richard Raffoul; Miguel Sousa Uva; Giuseppe Rescigno; Enri Belli; Marcio Scorsini; Frederic Pouillant; Arrigo Lessana; Aubervilliers, France

1302 CYTOLOGICALLY PROVED MALIGNANT PLEURAL EFFUSIONS: DISTRIBUTION OF TRANSDUCTATES AND EXUDATES  
Zakaria Assi; James L. Caruso; James Herndon; Edward F. Patz, Jr., Durham, North Carolina

1305 SCLEROThRAPY FOR MALIGNANT PLEURAL EFFUSIONS: A PROSPECTIVE RANDOMIZED TRIAL OF BLEOMYCIN VS DOXYCYCLINE WITH SMALL-BORE CATHETER DRAINAGE  
Edward F. Patz, Jr., Durham, North Carolina; Mai Holman Page McAdams, MC USA, Holon, Israel; Jeremy John Erasmus; Philip C. Goodman; Donna Culhane; Robert C. Gilkeson; James Herndon, Durham, North Carolina

1312 RESPIRATORY CHANGES DUE TO LONG-TERM EXPOSURE TO URBAN LEVELS OF AIR POLLUTION: A HISTOPATHOLOGIC STUDY IN HUMANS  
Marcelo B. Souza; Paulo Hilario Saldiva, Sao Paulo, Brazil; C. Arden Pope III, Provo, Utah; Vera Luiza Capelozzi, Sao Paulo, Brazil

1319 THE INFLUENCE OF GENDER ON COUGH REFLEX SENSITIVITY  
Peter V. Dicpinigaitis, Bronx, New York; Khalid Rauf, Imperial, California

1322 PEDIATRIC REFERENCE VALUES FOR RESPIRATORY RESISTANCE MEASURED BY FORCED OSCILLATION  
Francine M. Ducharme; G. Michael Davis, Montreal, Canada; Gilles R. Ducharme, Montpellier, France

1329 TREATMENT OF IDIOPATHIC BRONCHIECTASIS WITH AEROSOLIZED RECOMBINANT HUMAN DNASE I  
Anne E. O'Donnell, Washington, DC; Alan F. Barker, Portland, Oregon; Jonathan S. Ilowite, Mineola, New York; Robert B. Fick, Jr., Iowa City

1335 EFFECTS OF TRACHEAL SUCTIONING ON RESPIRATORY RESISTANCES IN MECHANICALLY VENTILATED PATIENTS  
Jean Guglielmino; Jean-Marie Desmonts; Bertrand Dureuil, Paris, France

1339 THE USE OF NONINVASIVE POSITIVE PRESSURE VENTILATION IN THE EMERGENCY DEPARTMENT: RESULTS OF A RANDOMIZED CLINICAL TRIAL  
Kelly A. Wood, Pittsford, New York; Larry Lewis; Benjamin Von Harz; Marin H. Kollef, St. Louis

1347 ASSESSMENT OF THREE METHODS TO REDUCE THE INFLUENCE OF MATHEMATICAL COUPLING ON OXYGEN CONSUMPTION AND DELIVERY RELATIONSHIPS  
John T. Granton, Toronto, Canada; Keith Walley; P. Terry Phang; James A. Russell, Vancouver, Canada; Samuel Lichtenstein, Toronto, Canada

1356 PROTECTIVE EFFECTS OF ISCHEMIC PRECONDITIONING ON DONOR LUNG IN CANINE LUNG TRANSPLANTATION  
Guohu Li; Shengxi Chen; Haife Jiang; Wan-zhong Lou, Hunan, People's Republic of China

1360 THE THERAPEUTIC POTENTIAL OF NITRIC OXIDE IN LUNG TRANSPLANTATION  
Keith C. Meyer; Jerry J. Zimmerman, Madison, Wisconsin

1372 PATHOPHYSIOLOGY OF CARDIAC TAMPOONADE  
David H. Spodick, Worcester, Massachusetts

1379 THE ASSAULT ON THE SWAN-GANZ CATHETER: A CASE HISTORY OF CONSTRAINED TECHNOLOGY, CONSTRAINED BEDSIDE CLINICIANS, AND CONSTRAINED MONETARY EXPENDITURES  
Max Harry Weil, Palm Springs, California

1387 A RANDOMIZED COMPARISON OF EXERCISE TRAINING IN PATIENTS WITH NORMAL VS REDUCED VENTRICULAR FUNCTION  
Ute Goebels, Chur, Switzerland; Jonathan Myers, Palo Alto, California; Gerald Dziekan; Peter Muller; Max U. Kuhn; Reto Ritter; Paul Dubach, Chur, Switzerland

1394 THE ROLE OF ATROPINE PREMEDICATION IN FIBROPTIC BRONCHOSCOPY USING INTRAVENOUS MIDAZOLAM SEDATION  
Tim J. Williams; Tina Brooks; Cliff Ward, Kettering, UK

1399 CHRONIC MITRAL REGURGITATION: WHEN AND HOW TO OPERATE  
Morton E. Tavel, Indianapolis; Blase A. Carabello, Charleston, South Carolina

1402 THE VALUE OF ND-YAG LASER FOR THE SURGERY OF LUNG METASTASES IN A RANDOMIZED TRIAL  
Tommaso Claudio Mineo; Vincenzo Ambrogi; Eugenio Pompeo; Italo Nofroni, Rome, Italy

1408 LUNG MASS AND LARGE COMPLEX LIVER LESIONS  
John A. Clark; Robert H. Hyland; Abraham Shaya, Toronto, Canada

1411 A MIDDLE-AGED WOMAN WITH CHRONIC PRODUCTIVE COUGH DIAGNOSED USING SPUTUM WET MOUNT EXAMINATION  
Col Kenneth G. Torrington, MC USA, APO, AP; Peter L. McEvoy, Washington, DC

1415 CARDIOMYOPATHIC LENTIGINOSIS/LEOPARD SYNDROME PRESENTING AS SUDDEN CARDIAC ARREST  
Alexander Woywodt; Julia Welzel; Henning Haase; Anke Duerholz; Uwe Wiegand; Juergen Potratz; Abdolhamid Sheikhzadeh, Luebeck, Germany

1417 CORONARY ARTERY SPASM COMPLICATING ANAPHYLAXIS SECONDARY TO SKIN DISINFECTANT  
Viviane M. A. Conraads; Philippe Jorens, Edgem, Belgium; D. G. Ebo, Antwerp, Belgium; Marc J. Claeys; Johan M. Bosmans; Christian J. M. Vrints, Edgem, Belgium

1419 FALSE ELEVATION OF SERUM CREATININE FOLLOWING SKIN ABSORPTION OF NITROMETHANE COMPLICATES THE CLINICAL DIAGNOSIS OF RHABDOMYOLYSIS  
Andrea Gabrielli; Catherine Hammett-Stabler, Gainesville, Florida

1423 ONLINE JOURNALS: MOVING IN THE RIGHT DIRECTION  
Marc S. Rovner, Lima, Ohio

1423 TREATMENT OF SPONTANEOUS PNEUMOTHORAX: THE CLINICIAN'S PERSPECTIVE ON PNEUMOTHORAX MANAGEMENT  
Andrew C. Miller, Surrey, England; Response—Michael H. Baumann, Jackson, Mississippi; Charlie Strange, Charleston, South Carolina

1425 ACE INHIBITOR AND SWALLOWING REFLEX  
Katsuoshi Nakayama; Kiyohisa Sekizawa; Hide-tada Sasaki, Sendai, Japan

1425 USEFULNESS OF CARCINOEMBRYONIC ANTIGEN IN PLEURAL EFFUSION DIAGNOSIS  
Valeriano Foresti, San Donato Milanese, Italy; Antonio Villa; Nadia Scilar, Milan, Italy; Response—Eduardo Garcia-Pachon; Isabel Padilla-Navas, Alicante, Spain

1426 PLEURAL FLUID PH DETERMINATION  
Ryland P. Byrd, Jr., Mountain Home, Tennessee; Response—Thomas M. Roy, Johnson City, Tennessee

1427 HOW OFTEN SHOULD  $\beta$ -AGONISTS BE ADMINISTERED?

Gustavo Rodrigo; Carlos Rodrigo, Montevideo, Uruguay

1428 ADRENOMEDULLIN: A PLAYER AT HIGH ALTITUDE?  
Marcell Toepper; Gunther Hartmann; Maximilian Schlosshauer, Munich, Germany; Hubert Hauthmann, München, Germany; Matthias Tschop, Munich, Germany; Rainald Fischer, München, Germany; Rudolf M. Huber, Munich, Germany

1428 SOLITARY PULMONARY LESION EVALUATIONS  
Fred Fefer; Bernard Suster, New York  
Response—Becki Goldberg-Kahn; James C. Healy; John W. Bishop, Omaha, Nebraska

1429 A SEDATION PROTOCOL TO PREVENT SELF-EXTRICATION  
Ira J. Wagner, New York  
Response—Robert M. Palmer; Lorraine C. Mion, Cleveland

**NUMBER 5, MAY, 1998**  
**SUPPLEMENT**

289S CHAPTER 1. INTRODUCTION: NEW DEVELOPMENTS IN MECHANICAL VENTILATION

291S CHAPTER 2. MANAGEMENT OF VENTILATOR-ASSISTED INDIVIDUALS

302S CHAPTER 3. NONINVASIVE AND INVASIVE MECHANICAL VENTILATION

309S CHAPTER 4. PLANNING FOR DISCHARGE, CARE, AND REHABILITATION

317S CHAPTER 5. EQUIPMENT AND RESOURCES FOR CARE BEYOND THE ICU

322S CHAPTER 6. MANAGEMENT OF PEDIATRIC PATIENTS REQUIRING LONG-TERM VENTILATION

337S CHAPTER 7. ETHICAL ISSUES

339S REFERENCES

**NUMBER 6, JUNE, 1998**

1431 CPT CODING AND MEDICARE REIMBURSEMENT: FROM BEANS TO BULLETS  
Walter J. O'Donohue, Jr., Omaha, Nebraska

1432 E&M GUIDELINES: IS THE MEDICAL RECORD A DATABASE REPOSITORY OR A COMMUNICATION TOOL?  
Robert W. Hand, Medford, Massachusetts

1434 THE UNITED STATES AND WORLDWIDE TUBERCULOSIS CONTROL: A SECOND CHANCE FOR PRINCE PROSPERO  
David E. Griffith, Tyler, Texas

1436 PULMONARY ARTERIAL HYPERTENSION: DIPPING INTO THE RESERVE  
Mitchell A. Olman, Birmingham, Alabama

1438 PHYSIOLOGY OF LUNG RESECTION: NO RULES, JUST . . . RX  
Gerald N. Olsen, Columbia, South Carolina

1439 SHERLOCK HOLMES, ALBRECHT DÜRER, AND SOCRATES: THE INTERNATIONAL LABOUR OFFICE RADIOGRAPHIC CLASSIFICATION OF PNEUMOCONIOSIS REASSESSED FOR ASBESTOSIS  
Albert Miller, Jamaica, New York

1442 THE UNCERTAIN VALUE OF THE DEFINITION FOR SIRS  
Steven M. Opal, Pawtucket, Rhode Island

1443 THE DIAGNOSTIC STRATEGY FOR PNEUMOCYSTIS CARINII: IS DOING LESS BETTER THAN DOING MORE?  
Carl M. Kirsch, San Jose, California

1446 INITIAL DRUG REGIMENS FOR THE TREATMENT OF TUBERCULOSIS: EVALUATION OF PHYSICIAN PRESCRIBING PRACTICES IN NEW JERSEY, 1994-1995  
Zhiyuan Liu; Kenneth L. Shirkret; Lyn Finelli, Trenton, New Jersey

1452 EPIDEMIOLOGY AND CLINICAL CONSEQUENCES OF DRUG-RESISTANT TUBERCULOSIS IN A GUATEMALAN HOSPITAL  
Edward M. Harow, Bangor, Maine; Josef M. Rangel, Palo Alto, California; J. Manuel Arriaga, Quetzaltenango, Guatemala; Isaac Cohen, Miami; Marta Ileana de Leon Regil Ruiz, Quetzaltenango, Guatemala; Kathryn DeRiemer, Berkeley, California; Peter Small, Stanford, California

1459 EVALUATION OF PULMONARY ARTERY PRESSURE DURING INCREMENTAL EXERCISE BY DOPPLER ECHOCARDIOGRAPHY IN ADULTS WITH ATRIAL SEPTAL DEFECT  
David A. Delberg, Boston; François Marcotte; Harvey Kreisman; Norman Wolfson; David Langenberg; David I. Small, Montreal, Canada

1466 A COMPARISON BETWEEN SYSTOLIC AORTIC ROOT PRESSURE AND FINGER BLOOD PRESSURE  
Eddy G. Philippe; Jean Louis Hebert; Catherine Coiraute; Karen Zamari; Yves Lecarpenter; Denis Chemla, Palaiseau, France

1475 QUANTIFICATION OF TRAUMATIC HEMOMEDIASTINUM USING TRANSESOPHAGEAL ECHOCARDIOGRAPHY: IMPACT ON PATIENT MANAGEMENT  
Philippe Vignon; Geoffrey Rambaud; Bruno François; Pierre-Marie Preux, Limoges, France; Roberto M. Lang, Chicago; Hervé Gastinne, Limoges, France

1481 EARLY EXTRICATION FOLLOWING CORONARY ARTERY BYPASS SURGERY: A PROSPECTIVE RANDOMIZED CONTROLLED TRIAL  
Brendan S. Silbert; John D. Santamaria; Jennifer L. O'Brien; Carolyn M. Blyth; William J. Kelly; Rowan R. Molnar, Melbourne, Australia

1489 ATRIAL FIBRILLATION AFTER BYPASS SURGERY: DOES THE ARRHYTHMIA OR THE CHARACTERISTICS OF THE PATIENTS PREDICT LONG HOSPITAL STAY?  
Steven Borzak; James Tisdale; Neeta B. Amin; A. David Goldberg; Diane Frank; I. Desmond Padis; Robert S. D. Higgins, Detroit

1492 PRESENTATION AND SURGICAL MANAGEMENT OF BRONCHOGENIC AND ESOPHAGEAL DUPLICATION CYSTS IN ADULTS  
Ugo Ciolfi; Luigi Bonavina; Matilde De Simone; Luigi Sentamaglio; Gianni Pavoni; Alberto Testori; Alberto Peracchia, Milan, Italy

1497 SERIAL LUNG FUNCTION AND ELASTIC RECOIL 2 YEARS AFTER LUNG VOLUME REDUCTION SURGERY FOR EMPHYSEMA  
Arthur F. Gelb, Lakewood, California; Matthew Brenner, Orange, California; Robert J. McKenna, Jr., Los Angeles; Richard J. Fischel, Orange, California; Noe Zamel, Toronto, Canada; Mark J. Schein, Lakewood, California

1507 PROLONGED AIR LEAK FOLLOWING RADICAL UPPER LOBECTOMY: AN ANALYSIS OF INCIDENCE AND POSSIBLE RISK FACTORS  
Amir Abolhoda; David Liu; Ari Brooks; Michael E. Burt, New York

1511 RECOVERY AND LIMITATION OF EXERCISE CAPACITY AFTER LUNG RESECTION FOR LUNG CANCER  
Kunimoto Nezu; Keiji Kushibe; Takashi Tojo; Makoto Takahama, Nara, Japan; Soichiro Kitamura, Suita-Osaka, Japan

1517 PROGRESSION OF ASBESTOSIS PREDICTS LUNG CANCER  
Panu Oksa, Tampere, Finland; Matthias L. G. Klockars; Antti Karjalainen; Matti S. Huusonen; Kimmo Vattulainen; Eero Pukkila; Henrik Nordman, Helsinki, Finland

1522 ADDITIONAL INFORMATION FROM PERCUTANEOUS CUTTING NEEDLE BIOPSY FOLLOWING FINE NEEDLE ASPIRATION IN THE DIAGNOSIS OF CHEST LESIONS  
Alexander N. Staroselsky; Yehuda Schwartz; Abraham Man; Silvia Marmur; Joel Greif, Tel Aviv, Israel

1526 DETECTION OF OCCULT MICROMETASTASES IN NON-SMALL CELL LUNG CARCINOMA BY REVERSE TRANSCRIPTASE-POLYMERASE CHAIN REACTION  
Christopher T. Salerno; Sandra Frizelle; Gloria A. Niehans; Sam B. Ho; Malathi Jakkula; Robert A. Kratzke; Michael A. Maddaus, Minneapolis

1533 PREDICTION OF MORTALITY IN FEBRILE MEDICAL PATIENTS: HOW USEFUL ARE SYSTEMIC INFLAMMATORY RESPONSE SYNDROME AND SEPSIS CRITERIA?  
Aikko W. J. Bossink; A. B. Johan Groeneweld; C. Erik Hack; Lambertus G. Thijss, Amsterdam, the Netherlands

1542 INFECTIVE EXACERBATIONS OF CHRONIC BRONCHITIS: RELATION BETWEEN BACTERIOLOGIC ETIOLOGY AND LUNG FUNCTION  
Jorg Eller; Anja Ede; Tom Schaberg, Berlin, Germany; Michael S. Niederman, Mineola, New York; Harald Mauch; Hartmut Lode, Berlin, Germany

1549 SUSPECTED RESPIRATORY TRACT INFECTION IN THE TRACHEOSTOMIZED CHILD: THE PEDIATRIC PULMONOLOGIST'S APPROACH  
Lee S. Rusakow; Margarita Guarin; Carole B. Wegner; Thomas B. Rice; Elaine Mischler, Milwaukee

1555 A COMPARISON OF INDUCED AND EXPECTORATED SPUTUM FOR THE DIAGNOSIS OF PNEUMOCYSTIS CARINII PNEUMONIA  
Mark L. Metters; Jaber Aslazadeh; Paulette Stelmach, Farmington, Connecticut

1560 EFFECT OF COLD AIR ON EXERCISE CAPACITY IN COPD: INCREASE OR DECREASE?  
Heikki Koskelo, Camperdown, Australia; Jussi Pihlajamaki; Heikki Pekkanen, Kuopio, Finland; Hannu Tukiainen, Siilinjärvi, Finland

1566 RESPIRATORY RESISTANCE IN THE EMERGENCY DEPARTMENT: A REPRODUCIBLE AND RESPONSIVE MEASURE OF ASTHMA SEVERITY  
Francine M. Ducharme; G. Michael Davis, Montreal, Canada

1573 REGIONAL LUNG DEPOSITION AND CLEARANCE OF <sup>99m</sup>Tc-Labeled BECOMETHASONE-DLPC LIPOSOMES IN MILD AND SEVERE ASTHMA  
S. Marianne Saari, Tampere, Finland; Mika T. Vidgren, Kuopio, Finland; Matti O. Koskinen; Vaino M. H. Turjanmaa, Tampere, Finland; J. Clifford Waldrep, Houston; Markku M. Nieminen, Pirkkolinna, Finland

1580 RELATIVE SURVIVAL ANALYSIS OF 252 PATIENTS WITH COPD RECEIVING LONG-TERM OXYGEN THERAPY  
Pascal Foucher; Nicolas Baudouin; Miloud Merati, Dijon, France; Alexandre Pitard, Besançon, France; Philippe Bonnaffont; Olivier Reybet-Desgrat; Louis Jeannin, Dijon, France

1584 EFFECT OF REGULAR USE OF HIGH DOSE NEBULIZED  $\beta_2$ -AGONISTS ON RESTING ENERGY EXPENDITURE, WEIGHT, AND HANDGRIP STRENGTH IN PATIENTS WITH CHRONIC AIRFLOW LIMITATION  
Jo Congleton, London, England; Martin F. Muers, Leeds, United Kingdom

1595 UPPER AIRWAY CHANGES IN SNORERS AND MILD SLEEP APNEA SUFFERERS AFTER UVELOPALATOPHARYNGOPLASTY (UPPP)  
Thierry Langin; Jean-Louis Pépin, Grenoble, France; Sarah Pendlebury, Oxford, England; Hélène Baranton-Cantin; Gilbert Ferreth; Emile Rey; Patrick A. Lévy, Grenoble, France

1604 CHANGES IN URINARY URIC ACID EXCRETION IN OBSTRUCTIVE SLEEP APNEA BEFORE AND AFTER THERAPY WITH NASAL CONTINUOUS POSITIVE AIRWAY PRESSURE  
Hamid Sahebjami, Cincinnati

1609 ISOLATED PULMONARY CAPILLARITIS AND DIFFUSE ALVEOLAR HEMORRHAGE IN RHEUMATOID ARTHRITIS AND MIXED CONNECTIVE TISSUE DISEASE  
Marvin I. Schwarz; Martin R. Zamora; Tony N. Hodges; Edward D. Chan; Russell P. Bowler; Rubin M. Tudor, Denver

1616 DOES N-ACETYL-L-CYSTEINE INFLUENCE CYTOKINE RESPONSE DURING EARLY HUMAN SEPTIC SHOCK?  
Herbert Spaten; Haibo Zhang; Christian Demenet; Wim Vlemmix; Jean-Louis Vincent; Luc Huuyghens, Brussels, Belgium

1625 THE COMPENSATORY ANTI-INFLAMMATORY CYTOKINE INTERLEUKIN 10 RESPONSE IN PEDIATRIC SEPSIS-INDUCED MULTIPLE ORGAN FAILURE  
Lesley Dougherty; Joseph A. Carrillo; Sandra Kaplan; Janine Janosky, Pittsburgh

1632 EXPRESSION OF INDUCIBLE NITRIC OXIDE SYNTHASE AND INFLAMMATORY CYTOKINES IN ALVEOLAR MACROPHAGES OF ARDS FOLLOWING SEPSIS  
Atsuko Kobayashi; Satoru Hashimoto; Kunihiko Kooguchi; Yoshihiro Kitamura; Hideaki Onodera; Yoji Urata; Tsukasa Ashihara, Kyoto, Japan

1640 EFFECT OF L-NNAME, AN INHIBITOR OF NITRIC OXIDE SYNTHESIS ON CARDIOPULMONARY FUNCTION IN HUMAN SEPTIC SHOCK  
Jurgen A. M. Avontuur; Rudolf P. Tutein Nolthenius; Steven L. C. Buijk; Karan J. K. Kanher; Hajo A. Bruijn, Rotterdam, the Netherlands

1647 THE VALUE OF ROUTINE POST-TRACHEOSTOMY CHEST RADIOGRAPHY  
Michael Tarnoff; Michael Moncure; Felician Jones; Steven E. Ross; Martin Goodman, Camden, New Jersey

1650 DELIVERY OF INHALED NITRIC OXIDE USING THE OHMEDA INNOVENT DELIVERY SYSTEM

Max Kirmse; Dean R. Hess; Yuji Fujino; Robert M. Kacmarek; William E. Hurford, Boston

**1658 THE COMBINATION OF PARTIAL LIQUID VENTILATION AND INHALED NITRIC OXIDE IN THE SEVERE OLEIC ACID LUNG INJURY MODEL**  
Tokujiro Uchida; Koichi Nakazawa; Kuninori Yokoyama; Koshi Makita; Keisuke Amaha, Tokyo, Japan

**1667 RESPIRATORY MECHANICS AFTER PROSTHETIC RECONSTRUCTION OF THE CHEST WALL IN NORMAL RATS**  
Amarilio V. Macedo-Neto; Leonardo V. Santos; Sara L. S. Meneses; Daniela S. S. Paiva; Patricia R. M. Rocco; Walter A. Zin, Rio De Janeiro, Brazil

**1673 TROPICAL PULMONARY EOSINOPHILIA**  
Kian Chung Ong, Singapore; Ramona L. Doyle, Stanford, California

**1680 THE "BIG TOBACCO" SETTLEMENT: IMMUNITY IS FOREVER**  
Frederic W. Grannis, Duarte, California

**1682 THE "BIG TOBACCO" SETTLEMENT: THE ACCP VIEWPOINT**  
D. Robert McCaffree, Oklahoma City

**1684 METERED-DOSE INHALER TO DELIVER METHACHOLINE IN BRONCHIAL PROVOCATION TESTING: A PILOT STUDY**  
Nicolas Roche; Fayssal El Husseini; Sylvie Labrune; Violaine Giraud; Thierry C. Chinet; Gerard J. Huchon, Boulogne, France

**1689 USE OF GUIDELINES IN TREATING COMMUNITY ACQUIRED PNEUMONIA**  
Theodore K. Marras; Charles K. Chan, Toronto, Canada

**1695 LEFT VENTRICULAR FILLING PRESSURES DURING EXERCISE: A CARDIOLOGICAL BLIND SPOT?**  
John B. West, La Jolla, California

**1698 RADIOGRAPHIC ASSESSMENT OF HYPERINFLATION: CORRELATION WITH OBJECTIVE CHEST RADIOGRAPHIC MEASUREMENTS AND MECHANICAL VENTILATOR PARAMETERS**

Margaret M. Johnson, Ponte Vedra Beach, Florida; Eugene Wesley Ely, Jr.; Caroline Chiles; David L. Bowton; Rita I. Friemans; Robert H. Choplin; Edward F. Haponik, Winston-Salem, North Carolina

**1705 HEART OR LUNG DISEASE: DETERMINING THE PRIMARY CAUSE FOR DYSPNEA ON EXERTION**  
Steven R. Mohmssen, Columbus, Indiana; Col Idelle M. Weisman, MC, USA; R. Jorge Zeballos, El Paso, Texas; Adrian Hall, Melbourne, Australia; Karlman Wasserman, Torrance, California; Morton E. Tavel, Indianapolis

**1711 AN UNUSUAL CASE OF PSEUDOCARDIOMEGALY**  
Updesh Singh Sidhu, London, England; Vineeta Malhotra; Gurneet Singh Chhina, Punjab, India

**1715 ELEVATED RIGHT HEMIDIAPHRAGM AND ABDOMINAL PAIN IN A 36-YEAR-OLD POSTPARTUM WOMAN**  
Janet M. Nicolas; John Elkas; CDR Allen H. Roberts, II, MC USN, Bethesda, Maryland

**1718 WHOLE-LUNG LAVAGE IN ALVEOLAR PROTEINOSIS BY A MODIFIED LAVAGE TECHNIQUE**  
Roland Bingisser; Vladimir Kaplan; Andreas Zollinger; Ench W. Russi, Zurich, Switzerland

**1720 DOUBLE JEOPARDY: LUNG CANCER AFTER CARDIAC TRANSPLANTATION**  
William M. Johnson; Olafur Baldursson; Thomas J. Gross, Iowa City

**1723 LARGE AIRWAY DISEASE ASSOCIATED WITH INFLAMMATORY BOWEL DISEASE**  
Avrum Spira; Ronald F. Grossman; Meyer S. Balter, Toronto, Canada

**1726 TREPOPNEA FOLLOWING LUNG RESECTION DUE TO INTERTRIAL SHUNT**  
Salem Alfaifi; Stephen E. Lapinsky, Toronto, Canada

**1728 REFLECTIONS ON THE REVISIONS IN THE INTERNATIONAL SYSTEM FOR STAGING LUNG CANCER**  
Ramon Rami-Porta, Terrassa, Spain

Response—Clifton F. Mountain, La Jolla, California

**1729 AVOIDING AIR SAMPLES IN PLEURAL FLUID PH SAMPLES**  
A. Ross Hill, Brooklyn, New York

Response—Lawrence S. Goldstein, Cleveland Heights, Ohio; Alejandro C. Arroliga, Cleveland

**1730 BILATERAL THORACOSCOPIC STAPLE LUNG VOLUME REDUCTION SURGERY: DOES IMPROVEMENT IN DYSPNEA CORRELATE WITH IMPROVEMENT IN PULMONARY FUNCTION**  
Shinji Teramoto, Tokyo, Japan

Response—Matthew Brenner, Orange, California

**1731 EARLY "PROFIBROTIC" OR REPAIR ACTIVITY IN THE LUNG DURING CARDIOPULMONARY BY-PASS: WHO IS THE CULPRIT?**  
Olivier Lesur, Sherbrooke, Canada

Response—Daniel Deneizelin, Sao Paulo, Brazil

**1731 COST-EFFECTIVE PLEURODESIS**  
Yossef Aelony, Rancho Palos Verdes, California

Response—Donald E. Low; Peter Zimmer, Seattle

**1732 SEIZURES AND PULMONARY EMBOLISM**  
Herbert L. Fred, Houston

**1732 SUPERIOR VENA CAVA OBSTRUCTION IN CYSTIC FIBROSIS**  
C. Vaughn Strimlan, Pittsburgh

**1733 FOREIGN BODY ASPIRATION INTO THE LOWER AIRWAYS MAY NOT BE UNUSUAL IN OLDER ADULTS**  
Shinji Teramoto; Takeshi Matsuse; Yasuyoshi Uuchi, Tokyo, Japan

**1735 CONTENTS INDEX, VOLUME 113 (JANUARY-JUNE, 1998)**

**1744 AUTHOR INDEX, VOLUME 113 (JANUARY-JUNE, 1998)**

**1751 SUBJECT INDEX, VOLUME 113 (JANUARY-JUNE, 1998)**